

EXTERNAL STAKEHOLDER REVIEW

What is the Regional Sustainability Plan?

The Pacific Rim Regional Sustainability Plan is a comprehensive effort to bring sustainable practices and methods to the forefront of our organization. The Plan sets forth a mission to instill sustainability as an intrinsic component of our operations by understanding its relationship with workplace culture and ensuring the widespread accessibility of its applications. Framed around five main focus areas, the Plan will transform the way we work so that we can operate more efficiently; align more closely with customer agency, taxpayer, and national goals; and alleviate our impact on the natural environment.

Where Can I Find the Regional Sustainability Plan?

The Regional Sustainability Plan has been compiled into a PDF document to facilitate its distribution to GSA's broader community of stakeholders. Region 9 has made a concerted effort to develop a digital forum, which is accessible to internal agency associates. This online tool allows ease of access and enhances collaboration between respective Branches, Divisions, Offices, and Services.

This PDF document represents a static picture in time and may not be reflective of the actual sustainable initiatives in place. While hyperlinks have been created throughout the document to enhance the user's experience, the links that direct the reader to the GSA Insite Page(s) and those found in the Blueprints (Section 5.2) will not be accessible to external viewers.

Region 9 Pacific Rim

REGIONAL SUSTAINABILITY PLAN

<https://sites.google.com/a/gsa.gov/pacific-rim-sustainability/r9-sustainability-plan>

July 8, 2013



PACIFIC RIM REGIONAL SUSTAINABILITY PLAN

Table of Contents

1.0	Introduction	1
2.0	Case for Change	3
3.0	Current State	6
	High-Level Assessment	8
	Region at Large	
	Green Programs and Initiatives	
	Regional Customer Profiles	
	Sustainability Focus Areas	11
	Buildings	
	Transportation	
	Supply Chain	
	Workplace Transformation	
	Sustainable Community	
	Key Performance Indicators	33
	Overall Dollar Savings	
	Clean Power	
	Energy Reductions	
	Greenhouse Gas Emissions	
	Water Reductions	
	Waste	
	Tenant Satisfaction	
4.0	Future State	38
	Buildings	39
	Transportation	42
	Supply Chain	43
	Workplace Transformation	45
	Sustainable Community	46
5.0	Strategies	47
	Overarching Approaches	48
	Roadmap	55
	Appendix	

1.0 INTRODUCTION

SUSTAINABILITY DEFINED

Defining sustainability is challenging in any context and, as can be evidenced in the prominent issues of today, is crucial at a global level. For the Pacific Rim Regional Sustainability Plan (the Regional Plan), it is important to understand sustainability's fundamental relationship to all levels of business within GSA and its impacts to the longevity and viability of our agency.

The Pacific Rim Region (Region 9) strives to ensure that sustainability is comprehensive and intrinsic to all work functions and focus areas. At a primary level, sustainability diverts waste and saves water and energy; these commonly used measurements for GSA are not new to our business. With the development of this Regional Plan, these factors are formalized and heightened into *key performance indicators* to be tracked with keen emphasis on maximizing impact with minimal investment.

Additionally, it is important to understand the universality of our Greenhouse Gas (GHG) emissions.^{1 2} With the goal of optimizing and reducing emissions, GHG analysis allows for a normalization of impacts across business lines and with our customers agencies and industry partners.

In support of a comprehensive approach to assessing our environmental impacts, Region 9 endeavors to apply Life-Cycle Analysis (LCA) to all aspects of our business.^{3 4} A deep understanding of the 'cradle-to-grave' lifecycle of our purchases – from the initial gathering of raw materials to final disposal of the manufactured product – is particularly relevant when examining our building projects and our supply chain.

Finally, the livability of our buildings rests at the heart of a sustainable Region 9. Providing natural daylight, fostering a connection to nature, and improving indoor air quality are only a few ways in which Region 9 will address livability and the human and behavioral impacts of a sustainable built environment. By understanding the congruency of space and the sensory impacts of design, Region 9 aspires to be better positioned to provide spaces allowing for greater collaboration and efficient use.

Region 9's long-held dedication to sustainability has compelled the region to embark on a comprehensive effort to operationalize GSA's National Strategic Sustainability Performance Plan⁵ (the National Plan). The Regional Plan will be GSA's first attempt to outline a tactical approach to achieving the sustainability goals as set forth in the National Plan.

¹ EPA, Greenhouse Gas Emissions. <http://www.epa.gov/climatechange/ghgemissions/>

² EPA, EPA's Greenhouse Gas Emission Reductions. <http://www.epa.gov/oaintrnt/ghg/index.htm>

³ GSA Sustainable Facilities Tool. <http://gsasf.noblis.org/learn/about/400/life-cycle-assessment-lca-overview>

⁴ Whole Building Design Guide, Life-Cycle Cost Analysis. <http://www.wbdg.org/resources/lcca.php>

⁵ Appendix E

METHODOLOGY

The Regional Plan establishes the case for change and looks at five focus areas: buildings, transportation, supply chain, workplace transformation, and sustainable community. Within these areas, we have documented the current state of our sustainability activities, described our intended future state circa 2020, and offered a strategic roadmap that identifies strategies and barriers in the vein of realizing our future goals.

CURRENT STATE - PHASE ONE

Phase One documents the current state of our portfolio and operations, and is best described as a sustainability audit. In this phase, we identify Region 9's achievements within the five focus areas and provide an accounting of the impact to date on the key performance indicators of energy, water and GHG consumption trends. We acknowledge the deficiencies in our current state that could prevent us from reaching our full potential and meeting our 2020 goals.

FUTURE STATE - PHASE TWO

Phase Two provides a look into the intended future state of Region 9 and provides the sustainable vision upon which we build our roadmap and tactical approach. Again using the five focus areas, Phase Two sets the goals for each segment of business as related to the National Plan as well as the stated aspirations of Region 9 employees.

STRATEGIC ROADMAP - PHASE THREE

Finally, Phase Three synthesizes the information outlined in Phase One and Phase Two to provide the tactical roadmap by which Region 9 will achieve our future state and the goals set forth in the National Plan. Phase Three identifies potential barriers to success and offer suggestions for their circumvention, mitigation, or elimination. "Roadmaps" by focus area are provided for all levels of the organization to engage the region in a transformational manner.

With the publication of this Regional Plan, Region 9 has already successfully begun the implementation of several key methods and driving efforts identified in Phase Three, specifically as related to greening the supply chain and an integrated building-by-building analysis (Sustainable Buildings Team). It is also important to note that this plan is a living document that will adapt to the continually evolving nature of our business environment.

2.0 THE CASE FOR CHANGE

Why We Need a Plan

THE ENERGY AGE

In the second decade of the 21st century, the world is leveraging advances in technology to provide a higher quality of life for the world's population. The uses for technology are ever expanding and include everything from manufacturing, communications, health care and warfare. The shift to a technologically-based society has caused a dramatic increase in power consumption across the globe. In emerging economies such as China and India, massive power plants are being brought on line almost daily in an effort to generate enough energy to drive economic growth and prosperity.

These economies are competing with Europe and America for finite sources of fossil fuels like coal, oil, and natural gas. The competition for fuel sources is driving up costs and puts oil-producing countries in a commanding political position. The result has created an unstable and politically-charged environment with social unrest and turbulent spikes in pricing. Ultimately, the fight for resources has led to wars that have cost the U.S. trillions of dollars and thousands of lives.

Compounding the social effects, the increased use of fossil fuels is dramatically impacting the environment. The greenhouse gas and particulate emissions that result from burning fossil fuels will need to be mitigated at enormous costs. Nuclear power was expected to be a major source of clean, domestically produced power; however the environmental risks, as evidenced by historic nuclear disasters as most recently seen in the Fukushima Prefecture, are extraordinary. The trend is decidedly against a major expansion of nuclear power generation.

As we enter the Energy Age, access to affordable energy and sustainable power will be essential to economic growth, human health and prosperity. The U.S. and other nations are investing billions of dollars in developing technologies to harness renewable, non-polluting, sources of energy, and technologies to increase energy efficiency and process existing fossil fuels in a more environmentally responsible manner.

ADMINISTRATION MANDATES

In the Information Age, the U.S. was the largest producer and consumer of information technology. Through funding critical research and development, the Government was an early adopter of the resulting products and services helping to create domestic markets and reach economies of scale. As a result, American businesses were more competitive and the U.S. experienced the most robust economic growth since post World War II.

Similar to the effort and the success of the Information Age, the Obama Administration believes the U.S. must lead again in the Energy Age. By investing in technology to harness wind, solar and geothermal power, expanding the development of domestic sources of fossil fuel, and implementing energy sources that will increase efficiency and lower GHG emissions, the Administration's policies are intended to enhance our competitiveness in this emerging market. These products include highly efficient and alternatively fueled vehicles, renewable power systems, lighting, heating, ventilating and air conditioning (HVAC), and energy management systems for buildings, and the services to plan, install and operate these systems, are estimated to create millions of American jobs.

GSA is playing a pivotal role in the Federal Government's implementation of the Administration's energy policies. We design, build, maintain and operate a significant portion of the Government's building portfolio. In addition, GSA manages a significant portion of the supply chain used by other Federal agencies. GSA's Central Office has led the development of a National Strategic Sustainability Performance Plan (the National Plan) to ensure compliance with the Administration's Executive Order 13514, *Federal Leadership in Environmental, Energy and Economic Performance*, and other related laws and regulations. GSA's Work+Place and Client Portfolio Planning Program Management Organizations are leading the effort to ensure that GSA can assist other Federal agencies in meeting their energy and sustainability goals. Further, GSA is leveraging its purchasing power to promote sustainable procurement as a means of making the federal government more sustainable. GSA is increasing its offerings of sustainable products and services, providing training, and making it easier to find GSA's green offerings.

The role of the Federal Government as early adopter for these technologies will be crucial in catalyzing mass adoption. By creating demand for the resulting products and services, American suppliers will be equipped to reach economies of scale that will make them more cost effective for the commercial markets within the U.S. and globally.

TRANSFORMING THE FEDERAL GOVERNMENT

GSA received approximately \$5 billion from the American Recovery and Reinvestment Act (ARRA) to establish a Green Proving Ground for the deployment of innovative technologies, upgrade energy systems in the existing building portfolio, construct new, energy efficient buildings, green GSA's vehicle fleet and educating our vendors on the benefits of a sustainable supply chain. Efforts to validate the impact on energy consumption, cost savings and green house gas emissions are ongoing. Thus far, the results indicate significant reductions in energy usage, green house gas emissions, operating costs can be achieved.

Using sustainability as an organizing principle in helping GSA become “The Government Savings Agency” will result in a number of positive outcomes. First, this principle will aid GSA and federal agencies in saving taxpayer dollars by disposing of unneeded properties. Next, it will integrate sustainability into daily business practices instead of being an adjunct “program” vulnerable to budget cuts and will reduce the Federal Government’s environmental footprint. Finally, sustainability has tremendous potential to change the civil service culture within the Government.

This impact of culture change is most pronounced in workplace transformation initiatives. As an early adopter, GSA is starting to see the positive impact on our own bottom line. GSA stands ready to share experiences, assist other government agencies with embracing this approach, and ensure the Nation truly benefits from this program.

Workplace transformation incorporates a number of components that create a more efficient, effective, and responsive workforce. The components include open, collaborative work environments, increased use of teleworking, with IT and document management systems to support mobility, “touch-down” workstations for staff without fixed workplace assignments, and the repurposing of underutilized furniture and other personal property.

The reduced footprint that results from these workplace strategies not only lowers rents, utilities and other operating costs— it creates an atmosphere where the traditional hierarchical and stove pipe structures are eliminated. This environment promotes speedier decision-making and accentuates a more efficient use of resources, contributing to a reduced environmental footprint. Eliminating the one-to-one employee to workspace ratio encourages teleworking not just from home, but from customer locations, which will enable heightened understanding our customers’ business models and operational requirements.

As an early adopter of this approach, GSA is seeing the positive impact on our own “triple bottom line.”⁶ GSA stands ready to share our experiences, help other government agencies embrace this approach, and realize the full range of benefits.

Today, many Federal agencies are achieving space and cost reductions by taking an incremental approach such as shrinking workspaces from 180 square feet to 140 square feet. By adopting a transformative approach, our Federal customers will not only meet their space, cost and energy performance goals, they will reshape their workforce and become more competitive in delivering services to the American people.

As a steward of the environment and taxpayer dollar, being competitive is a non-negotiable. The American people deserve the highest quality service at the lowest possible cost.

⁶ Appendix F

3.0 CURRENT STATE

Where We Are

The Pacific Rim Region covers a vast and diverse territory that reaches from Window Rock, Arizona to Seoul, Korea. Region 9 manages 36 million square feet of real estate and serves customers in Arizona, California, Hawaii and Nevada, as well as overseas in American Samoa, the Commonwealth of the Northern Mariana Islands, Diego Garcia, Guam, mainland Japan and Okinawa, the Republic of Korea, Saipan, and Singapore.

Region 9 possesses a wealth of experience in sustainability. In addition to proactive compliance with the State of California's strict environmental codes, the Pacific Rim Region has recently implemented more than \$500 million in ARRA projects for energy upgrades in existing buildings and new energy-efficient buildings. Region 9 secured nearly half of the electric vehicles for the GSA Fleet National Plug-In Electric Vehicle Pilot program. The region also supports numerous military bases with clean power and energy efficient initiatives. Additionally, several buildings in the portfolio have obtained LEED status, including one LEED-NC Silver, one LEED-NC Gold, one LEED-EB Certified, one LEED-CI Certified, one LEED-CI Silver and one LEED-CI Gold. Eight in-progress new construction/major renovation projects and one commercial interior project are striving for LEED Gold or better.

Phase One – Current State provides a high-level view of the region, an identification of Region 9's achievements within five focus areas, and an accounting of the impact to-date of regionally and nationally key performance indicators. There may be deficiencies (barriers) that could prevent Region 9 from reaching the full potential of the Regional Plan and will address strategies to overcome them in subsequent phases.

Overarching issues covered in Phase One were derived from a still-ongoing series of iterative divisional workout sessions held to engage all levels of Region 9 employees.

The following sections assess the current state from three perspectives:

SECTION 3.1 – HIGH-LEVEL ASSESSMENT

This chapter first approaches the current state with a high-level view, and presents descriptions of the region's green programs and initiatives as well as an assessment of the current customer profile.

SECTION 3.2 – SUSTAINABILITY FOCUS AREAS

This chapter will then discuss the five sustainability focus areas (Buildings, Transportation, Supply Chain, Workplace Transformation, and Sustainable Community) that are most influential in achieving the region's long term sustainability goals.

SECTION 3.3 – KEY PERFORMANCE INDICATORS

Finally, this chapter will discuss the region's performance with respect to national and regional key performance indicators.

3.1 HIGH-LEVEL ASSESSMENT

3.1.1 REGION AT LARGE⁷

- 100,000+ federal employees
- Coverage Area: Arizona, California, Hawaii, Nevada, Japan, South Korea, Guam, Saipan
- Real Estate Portfolio of 36 million square feet
 - Over 150 government-owned buildings
 - Over 900 commercial lease locations
- 19 space types
 - 51% Office
 - 24% Common Space
 - 6% Light Industrial
- 35,000+ government vehicles
- Key Performance Indicators: ⁸ (See Table 1)
 - Energy Use
 - Water Use
 - GHG Emissions
 - Clean Energy Production
 - Dollars Saved
 - Waste Diversion

— LEED SCORECARD —

- One LEED-NC Silver
- One LEED-NC Gold
- One LEED-EB Certified
- One LEED-CI Certified
- One LEED-CI Silver
- One LEED-CI Gold
- In-Progress: Eight new construction projects and one commercial interior project are striving for LEED Gold or better

3.1.2 GREEN PROGRAMS AND INITIATIVES

REGION 9 SUSTAINABILITY COUNCIL

GSA's Chief Greening Officer convened a National Sustainability Council (NSC) with the directive to develop and apply innovative practices that support sustainable efforts. Region 9 has developed an internal council comprised of both FAS and PBS associates in support of the NSC. Region 9 Council representatives share best practices, compile newsletters, share operational performance plan language, investigate and roll out training programs, and assist with the implementation of the Regional Plan.

⁷ GSA, Region 9 InSite. <http://insite.gsa.gov/portal/category/510817>

⁸ Appendix A

TABLE 1: GSA - R9 INTERNAL KEY PERFORMANCE INDICATOR ANALYSIS

	KEY PERFORMANCE INDICATORS																		
	\$ Saved	GHG Savings			Energy Savings Fuel Savings			Renewable Energy Alternative Fuel			Water Savings			Waste Diversion			Participation		
		R9	Base Year	Goal	R9	Base Year	Goal	R9	Base Year	Goal	R9	Base Year	Goal	R9	Base Year	Goal	R9	Base Year	Goal
BUILDINGS																			
Operations																			
Energy	\$ 14,025,894 ¹	8.8% ▼	FY08	28.7% ²	11% ▼	FY03	37.5%	9% ³	p.y.	30%									
Water ⁴	TBD										19% ▼	13.6 gal/GSF	FY07 26% potable						
Waste													FY10 20% industrial, landscaping, agricultural						
Solid ⁵	\$ 68,335 ⁶	TBD ▼	FY08	50%												47.6% p.y.	50%		
Water	TBD	TBD ▼	FY08	5%												1,560 tons			
Disposal	\$ 174,159,398																		
SUPPLY CHAIN																			
Green Products ⁷	TBD	TBD			TBD						TBD								
100% Recycled Paper ⁸	\$ 32,400	562 tons			TBD						TBD								
TRANSPORTATION																			
Region-Wide Fleet	TBD	8.4% ⁹ ▲	FY09	3% ¹⁰	4.7% ▼	FY10	30% ¹¹	66% ▲	FY09	159% ¹²									
WORKSPACE TRANSFORMATION																			
Space Optimization	TBD	TBD			TBD						TBD								
AWS/Telework ¹³	TBD	TBD			TBD						TBD						TBD	p.y.	60%
Travel	\$ 1,120,158	TBD ▼	FY08	25%	TBD						TBD								
IT/GSA Workspace	TBD	TBD			TBD						TBD								
	\$ 189,337,850	All performance figures are as of publication date in Oct 2012										5 Goals based on 2015 target achievement							

All performance figures are as of publication date in Oct 2012
All goals unless otherwise noted are as stated in the National Sustainability Plan and based on a 2020 target date
p.y. = Per Year

1 Utility cost savings
2 Goal includes GHG savings from both Buildings and Transportation
3 Includes co-generation plants (4,929,649 kWh), photovoltaic arrays (4,102,525 kWh), and Renewable Energy Credits (13,144,000 kWh) for FY12
4 Includes both potable water and water for industrial, landscaping, and agricultural use

5 Goals based on 2015 target achievement
6 Dollars saved from recycling revenue
7 National Office Initiative
8 Total dollar amount represents savings due to schedule price negotiation.
9 GHG has increased a cumulative 8.4% since FY09, however trends show a 6% decrease from FY10-FY12.
10 National Goal baseline = FY08, however R9 does not have recorded data before FY09.
11 National Goal baseline = FY03, however R9 does not have recorded data before FY10.
12 National Goal baseline = FY05, however R9 does not have recorded data before FY09.
13 Goal based on 2012 target achievement

REGION 9 GREEN TEAM

Following the national office green team guideline, Region 9 supports several volunteer-staffed Green Teams at the regional and local levels. Currently there are two building-specific teams, one FAS-centric team, and one PBS/FAS enterprise team. These teams embrace the directive of using sustainable strategies in determining effective tools to improve the worker experience (GSA and Customer Agencies) throughout our buildings. For the next year, the Green Teams are focused on actively increasing employee engagement and understanding of sustainable initiatives.

GREEN PROVING GROUND

The Green Proving Ground (GPG) is a national effort that leverages GSA's real estate portfolio to evaluate sustainable building technologies. Evaluations performed in association with an independent analysis (by Department of Energy and others) and are used to support the development of GSA performance specifications and inform decision-making within GSA, other federal agencies, and the real estate industry.

— GPG RECENT ANALYSIS —

In FY12, GPG determined that desk-based electronics draw on average 25% of total electricity consumed in office buildings. Advanced Power Strips with timer controls offer significant energy savings and low simple payback, providing a strong argument for Agency-wide deployment.

Region 9 is also committed to other nationally-led efforts, including:

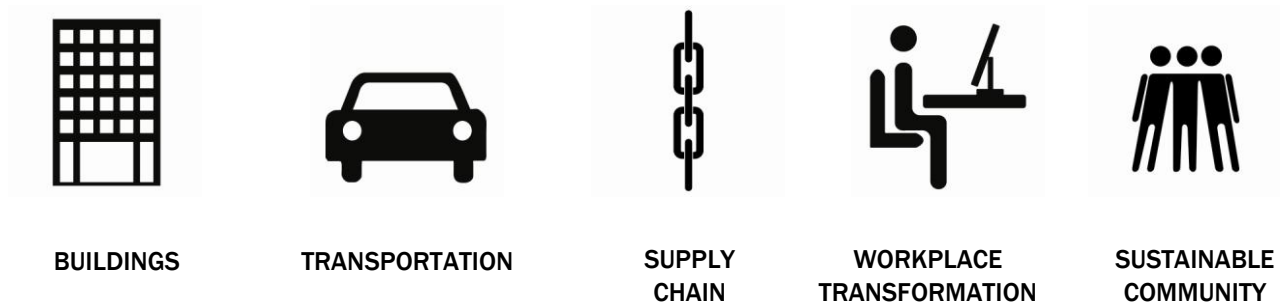
- Shave Energy
- BuildingLink System
- Zero Environmental Footprint (ZEF)
- Volume LEED Certification Team
- Sustainable Communications Effort
- Green Building Network

3.1.3 REGIONAL CUSTOMER PROFILES

Region 9 utilizes limited customer profile databases to track occupancy levels for customer agencies. At this time, there is no known effort to determine more accurate agency occupant numbers, time spent in office, or to otherwise cultivate an enhanced understanding of agency missions. This level of information would better support the depth of customer focus central to the Regional Plan and, accordingly, position GSA to more comprehensively accomplish our own mission.

3.2 SUSTAINABILITY FOCUS AREAS

The Regional Plan has assessed the current state in terms of five sustainability focus areas:



3.2.1 BUILDINGS



The Buildings focus area refers to the programs and projects that can physically affect how occupants of our buildings meet their missions while fulfilling the overall sustainability goals outlined in the Regional Plan.

The Buildings focus area is divided into two subsections: Projects and Programs.

BUILDINGS – PROJECTS AND PROGRAMS

The Buildings focus area includes New Construction/Major Renovation, Retrofits, Tenant Improvements, Green Leasing, Waste Diversion, and Real Property Disposal.

For the project-related focus areas, the physical and financial scale of each project, specific groups within the region develop strategies for project implementation and execution with a primary focus on on-time and under-budget project delivery. Within the last 5 years, GSA received nearly \$5 billion in ARRA funding nationwide. Of that amount, Region 9 awarded contracts for more than \$500 million in ARRA projects (See *Figure 1*). Preliminary calculations of the overall anticipated energy savings from ARRA limited-scope projects portion (approximately \$74 million) indicate GSA may reduce its consumption by nearly 85,000 mmBTU each year and save an estimated over \$5 million a year in operating costs.

In terms of investment strategies, long-term plans, and general information, much of what is known about our buildings is housed in the Asset Business Plan (ABP). Included in the ABPs are results from Web Building Evaluation Reports (WebBER) and Physical Condition Surveys (PCS) commissioned by

the Portfolio Management Division (PMD). While funding for regular evaluations remains tenuous, these reports often provide a thorough understanding of the condition of equipment and systems for each building. Additionally, the Whole Building Design Guide and related tools assist in driving our investment strategies, though they are not presently fully leveraged.

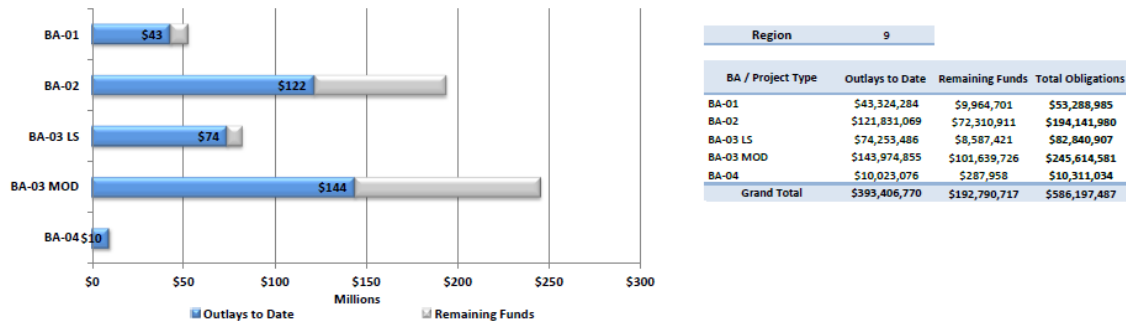


Figure 1
RAHD Report Generated September 1, 2012

Operations and Maintenance (O&M) services are on the frontline of our sustainable performance and directly affect the results of many building operations. Although overall the buildings are being operated and maintained satisfactorily and the cost is generally comparable to industry standards, little emphasis is currently being placed on the development of the role of our O&M service contractors with regard to Region 9's sustainable future. Broadly, current challenges include: limited emphasis on potential efficiencies possible through tighter, better managed operating plans; limited investment in ongoing education and training; some gaps in contractor technical expertise and ability; and an overall lack of consistency toward aligning agency and O&M management priorities to successfully implement new green technologies and services. In general, operating plans are not created with an emphasis on efficiency and moreover are not consistently adhered to. Additionally, there exist many opportunities to improve basic building conditions (e.g., air and water leaks, maladjusted controls) in which our O&M contractors must play a key role.

Finally, the construction service contractors currently bidding for public sector work (e.g., Architecture/Engineering Services, Construction Management, Construction Contracting) do not have a thorough understanding of the technical capability to perform the needed modifications and building improvements. There is a skill gap in understanding and competency with not only sustainable strategies, but also with general construction practices. This has been particularly present in limited-scope level projects.

3.2.1.1 PROJECTS New Construction/Major Renovation

The Design and Construction Division (D&C) manages several new construction and major renovation projects that incorporate sustainable goals:

NEW CONSTRUCTION



- **U.S. Courthouse**, San Diego, CA – LEED Silver (possibly Gold)
- **John M. Roll Courthouse**, Yuma, AZ - LEED Silver (possibly Gold)
- **Customs and Border Protection Housing**, Ajo, AZ – LEED Platinum
- **U.S. Courthouse**, Bakersfield, CA – LEED Gold (pending certification)

MAJOR RENOVATION



- **Prince Jonah Kuhio Kalanianaʻole Federal Building**, Honolulu, HI – LEED Silver (possibly Gold)
- **50 United Nations Plaza**, San Francisco CA – LEED Gold (possibly Platinum)
- **San Ysidro Land Port of Entry**, San Diego, CA – LEED Gold (possibly Platinum)
- **Mariposa Land Port of Entry**, Nogales, AZ – LEED Gold (possibly Platinum)

D&C has incorporated several sustainable building strategies in recent projects, including: computational fluid dynamics, adiabatic cooling, operable windows, natural daylighting, use of chilled beams, rainwater harvesting, and repurposing of historic buildings. Most of these sustainable efforts are decided ad hoc and there is no focus group or team around sustainable project/building elements at this time. Additionally, Design Excellence currently

focuses on the aesthetics above performance and building components such as envelope/glazing are compromised.

NEW CONSTRUCTION / MAJOR RENOVATION		
STANDARDS	PROCESSES	MEASUREMENT
<ul style="list-style-type: none"> • Publication PBS P-100, Facilities Standards for the Public Buildings Service • USGBC LEED Version 2.2 • EISA (2007): 30% energy reduction by 2015 as compared to the baseline case for new construction 	<ul style="list-style-type: none"> • Global Project Management (gPM) • Design Excellence • Early Whole Building Commissioning • Peer Reviews 	<ul style="list-style-type: none"> • LEED rating system • Recovery Act High Performance Green Building Dashboard (RAHD/eBUILD) • Operating cost reduction • Occupant engaging surveys • Industry recognition

Table 1
New Construction and Major Renovation Guidelines

3.2.1.2 PROJECTS Energy and Water Retrofits

Energy and water retrofit projects are designed to address the legislative mandates (e.g., the Energy Policy Act, Executive Orders, the Energy Independence and Security Act). The most recent round of ARRA projects has been specifically designed to these standards.

Several resources were used to evaluate our existing buildings, including: a targeted building survey, energy studies, retro-commissioning reports, and Green Proving Ground studies. Each building was assessed according to the following categories:

- Basic Building Information
- Support Tools (e.g., Commissioning, Diagnostics, Monitoring)
- Retrofit projects
- Overall energy usage
- Initial climate zone identification

Funding remains a critical element for retrofit projects. Region 9 has begun developing key alternatively financed projects utilizing Energy Savings Performance Contract (ESPC), and, Utility Energy Savings Contracts (UESCs). As an example, a multi-building ESPC in Los Angeles is currently in the solicitation phase. Region 9 is also in the early development phase of a multi-agency PPA, which will pave the way for agencies to leverage GSA strategic purchasing to finance renewable energy projects.

3.2.1.3 PROJECTS Tenant Improvements

Tenant improvements are typically driven by agency requests to address their immediate needs and are not necessarily aligned with the overall plan for the building or leased space. Generally, sustainable project considerations rank low in overall project development and execution of tenant improvements. Region 9 is working with agency contacts to develop longer-term portfolio driven strategies. For most tenant improvements, 8(a) contracts are used. Field offices typically manages projects equal to or less than \$150,000, Service Centers manage non-prospectus projects greater than \$150,000, and region level Design and Construction manages over the prospectus threshold. Currently, Region 9 currently has two tenant improvement projects, both at the Ronald Dellums Federal Building, that have achieved LEED-CI certification.

3.2.1.4 PROGRAMS Waste

Waste reduction strategies are administered within various divisions of PBS and FAS. As part of the larger waste diversion program, the Facilities Management Recycling Coordinator has

— R9 WASTE DIVERSION PROGRAM —

- Composting
- Recycling
- E-waste Program
- Education efforts

developed a comprehensive e-waste program. FAS' Personal Property Management Division is responsible for promoting and facilitating the reuse of various assets by many agencies. At the end of FY12, Region 9 re-utilized, recycled, or otherwise kept out of land

fill \$504 million worth of Federal property, or 99% of the personal property's target goal for the current fiscal year. Despite varying levels of tenant agency participation, Region 9 facilities have achieved a 47% waste diversion rate for FY12.

3.2.1.5 PROGRAMS Green Leasing

Within Region 9, 38 green lease clauses have been established and used for contract renewals. The review of applicable leases from January 2005 through September 2012 for Guiding Principle compliance is 99% complete and is reflected as follows:

- LEED: 46 leases in 37 buildings
- 38 Green Lease Clauses: 128 leases in 123 buildings

- Guiding Principle Compliant: 24% - 167 leases in 153 buildings
- Energy STAR: 141 leases in 94 buildings

3.2.1.6 PROGRAMS Real Property Disposal

The Real Property Disposal Division (RPDD) continues to help reduce the Region's environmental footprint and save money by optimizing our portfolio's physical footprint. From FY03 – FY12, RPDD sold or transferred properties, including:

- Acres – 188.17
- Properties – 46
- Buildings – 2
- Estimated Value - \$171,584,884
- Proceeds - \$82,099,215
- Value Proceeds - \$174,159,398

In the Regional Plan, RPPD will be an important partner in the Workplace Transformation efforts. This enhanced relationship will support the proper re-allocation or disposal of property to achieve space optimization.



3.2.2 TRANSPORTATION

The Transportation focus area refers to all non-military fleet vehicles purchased and used by GSA and customer agencies. Region 9 (GSA and its customers) operates approximately 34,000 leased vehicles that on average consume 55.3 million gallons of fuel annually, including 22.3 million gallons of low-emission ethanol (E85) fuel. These vehicles generate over \$101 million in annual savings (\$2,900 per vehicle) as compared to operating costs for the same vehicles managed by other agencies as direct-owned assets. GSA procures over 60,000 vehicles annually at prices typically 26% below the manufacturer's invoice price. Federal fleet's annual light duty vehicle acquisitions are required to include 75% alternative fuel vehicles (AFVs) in Metropolitan Statistical Areas (MSAs). Approximately 17,000 AFVs and hybrids are actively deployed in Region 9 (See *Table 3*). Region 9 facilitates nearly 100% of vehicle purchases made by agencies throughout California, Nevada, Arizona, and Hawaii.

CURRENT INVENTORY OF AFVS AND HYBRIDS								
Fuel Type	41 – Gasoline/E85	50 – Dedicated CNG	54 – Gasoline/CNG	64 – Gasoline/LPG	70 – Electric Vehicle	71 – Plug-In Hybrid/Gasoline	74 – Hybrid/Gasoline	Totals by Class
Total	14,939	138	103	1	81	49	1,690	17,001

Table 2

Current Inventory of Region 9 Fleet

As part of leased vehicles' regular replacement, Region 9 strives to use AFVs, electric, and low GHG vehicles wherever possible. In FY 2012, 84% of the replacement vehicles ordered were categorized as "green," as defined by the Energy Policy Act of 1992. The following is a breakout of current fleet by vehicle type:

- 43% AFV - E85
- 5% hybrid/gasoline
- 4.5% Low GHG
- 1.0% Compressed natural gas (CNG), gasoline/CNG capable, electric, plug-in hybrid/gasoline

ARRA funds have also had a significant impact on the greening of our fleet. In 2010, GSA doubled the federal hybrid fleet without increasing the total number of vehicles. The resulting improvement in fleet efficiency was expected to reduce petroleum consumption by the equivalent of an estimated 7.7 million gallons of gasoline, or 385,000 barrels of oil.

At the national level, GSA Fleet is working with the Federal Energy Management Program to expand the number of E85 stations throughout the nation in order to significantly boost E85 consumption. Region 9 continues to work with the state of California to identify the prospective locations and plans for seventy E85 refueling stations. Furthermore, Region 9 has purchased 56 agency-owned electric recharging stations.

GSA is also involved in the disposal of surplus vehicles. Vehicles are sold using either GSA on-line auction or contractor auction. In FY12, Region 9 sold 570 vehicles through GSA auctions and 649 vehicles have been transported and sold through contractor auctions, producing over \$2.64 million in sales.

3.2.3 SUPPLY CHAIN

As provided by the United Nations Global Compact website, “Supply chain sustainability is the management of environmental, social, and economic impacts, and the encouragement of good governance practices, throughout the lifecycles of goods and services.” The objective of Region 9’s supply chain is to fashion, support, and cultivate long-term value for all stakeholders. Our stakeholders include our customer agencies, GSA employees, our vendor community, and industry partners.

Region 9 is committed to understanding the expectations of our stakeholders as well as to embracing all collaborative efforts and opportunities available both internally and externally. Region 9 strives to increase the impact and overall efficiency of our efforts by extending outreach and pooling of resources.

Internally, FAS implemented a national Green Purchasing Program (GPP) in 2011 via GSA Order OGP 2851.2 to promote the purchase of environmental sustainable products and services. The GPP requires GSA to incorporate the above requirements into daily operations and to work towards increasing and expanding markets for environmentally sustainable products and services.

Implementation of the Regional Plan affects activities at both national and regional levels and requires GSA to:

- Supplement formal training efforts with other opportunities to educate its employees on green purchasing requirements and best practices;
- Communicate the GPP’s message to customers and industry through various educational efforts such as but not limited to making guidance available electronically, and updating green icons on GSA Advantage.
- Presenting relevant information at GSA, customer agency, and vendor conferences;
- Communicate success stories and showcasing of green buildings; and
- Highlight sustainable terms and conditions in GSA’s inter-agency acquisition vehicles.

The Supply Chain focus includes numerous purchasing vehicles available to GSA and our customer agencies such as but not limited to: Global Supply, the Multiple Award Schedules (MAS), Federal Strategic Sourcing Initiative (FSSI) Blanket Purchase Agreements (BPA), and GSAXcess.

GSA has developed several purchasing vehicles and tools to help customer agencies, vendors, and industry partners to facilitate the procurement of sustainable products and services. The various purchasing vehicles are further described as:

- ❖ **FEDERAL STRATEGIC SOURCING INITIATIVE (FSSI) BPAS** – The FSSI requires GSA to leverage buying power of the federal government to create savings, reduce cost, and increase overall

performance. The primary goals of the FSSI are to source across federal agencies, establish mechanisms to increase total cost savings, value and socioeconomic participation, collaborate with industry to develop optimal solutions, share best practices, and to create a strategic sourcing community of practice. Current commodity solutions include express and ground domestic delivery services (DDS2), Office Supplies (OS2), Print Management (PM), and wireless telecommunications expense management services (TEMS). These agreements as well as others currently under development are saving taxpayer dollars, energy, promoting the use of environmentally responsible products by reforming the procurement process.

- ❖ **GSA MULTIPLE AWARD SCHEDULE (MAS) CONTRACTS**⁹ - GSA has established long-term government-wide contracts with commercial firms to provide access to millions of products and services at volume discount pricing. Many of these contractors offer sustainable products and services which can be purchased from GSA Advantage or from the contractor directly.
- ❖ **GSA GLOBAL SUPPLY**¹⁰ - GSA's Global Supply online ordering system gives our customer agencies access to tools, office supplies, computers, and other supplies. GSA Global Supply ensures purchases from mandatory sources such as AbilityOne, UNICOR, and much more. Also available are sustainable products. For larger procurements and more complex requirements, GSA's Global Supply Special Order Program (SOP) provides complete, full acquisition management support, which further can assist our customer agencies in the purchase of sustainable products and services. Vendors can further compete for supply contracts through GSA's three Global Supply Acquisition Centers¹¹: Heartland Supply Operations Center (for tools, paints, sealants, and etc.), Southwest Supply Operations Center (signs, food service items, construction materials, facility management, and etc.), and the Northeast Supply Operations Center (office supplies, packaging supplies, toilet paper/paper towels, and paper products).

As it relates to the primary purchasing vehicles, current and prospective vendors submit proposals for these procurements and therefore, implementing sustainability considerations as well as product lifecycle analysis considerations into new and/or existing contracts are essential. However, incorporating environmental requirements seems a bit challenging and being able to modify current contracts is even more challenging and cannot be done on a regional level. However, some of those efforts are being driven on a national level to incorporate some of these requirements into new FSSI BPAs. Another challenge with MAS contracts is ensuring the sustainable product or service the vendor is providing complies with environmental requirements and whether or not sustainable products and services are identified correctly. Further, the ease of searching for sustainable products on GSA

⁹ GSA, GSA Schedules. <http://www.gsa.gov/portal/content/197989>.

¹⁰ GSA, GSA Global Supply. <http://www.gsa.gov/portal/content/101028>.

¹¹ GSA, Doing Business with GSA Global Supply. <http://www.gsa.gov/portal/content/264345>.

Advantage is cumbersome. There is a national renewed search improvement project underway that includes a number of enhancements to the GSA Advantage search engine, data quality, product categorization, and attributes assignment. The seven month project addresses many of the issues and final implementation of the enhancements will be released in multiple phases.

Next, the Federal Acquisition Service (FAS) has explored what incentives, if any, are available to our vendors and how can small businesses implement cost effective sustainable programs and/or incorporate product life cycle analysis in the development of their products. Further, GSA does not conduct a “cradle to grave analysis”—it not only improves waste diversion, but it would also enhance outreach with our vendors to offer more sustainable options. At this point it is important to recognize the challenges as related to the reporting back of sustainable purchases. This is not easily done through GSA Advantage. Additionally purchases made directly with a vendor cannot be tracked. There is not a current or an efficient way of requiring reporting from our vendors.

A network of Customer Service Directors with the FAS and the Client Service Directors with the Public Building Service (PBS) provide outreach and training on the purchase of green products and services and can drive those sustainable purchases through GSA’s various purchasing vehicles. Further, IOA’s across the nation are visiting with our vendors (MAS, Supply, and FSSI BPA holders) to ensure compliance with their contracts. The IOA’s currently help GSA green its supply chain by being the face of GSA to our vendors. The IOA gathers performance data as it relates environmental requirements, reports back on performance data through a visit report and report card, and educates these vendors on sustainability practices. The current environmental requirements reviewed by the IOA are whether or not the contractor is identifying items which qualify for environmental attributes and whether or not the contractor is identifying the environmental attributes correctly. A lot more can be done within GSA’s Supplier Management to provide outreach and education to these vendors as well as help further enhance the vendor’s marketing efforts to provide more sustainable products and services.

The various online tools to facilitate the procurement of sustainable products and services are further described as:

- ❖ **GSA ADVANTAGE**¹² is an online shopping and ordering system that provides our customer agencies with thousands of contractors and millions of supplies and services. Our customer agencies can utilize GSA Advantage to procure sustainable products and services from GSA MAS contracts and GSA FSSI BPAs. Customers can search for sustainable products by specific environmental attribute. Vendors are responsible for uploading their own GSA Advantage file; and for the identification of products which qualify for environmental attributes. The challenge here is whether or not our contract holders are identifying products which qualify (which is a requirement under their schedule contract); and whether or not our contract holders are

¹² GSA, GSA Advantage! <http://www.gsa.gov/portal/content/104677>.

identifying the attribute correctly. Again, our IOA's are reporting back on our contractor's compliance; however, more can be done here to further the vendor's understanding of the environmental requirements. Further effort as it relates to marketing options and/or resources for promoting their sustainable products and services is also needed.

- ❖ **GSA E-BUY¹³** is a component of GSA Advantage and is an online request for quote (RFQ) tool for GSA and customer agencies to facilitate the request for submission of quotations for a wide range of commercial supplies and services under GSA's MAS Contracts, Government-wide Acquisition Contracts (GWACs), Network Services, and Telecommunications contracts. GSA's vendor community utilizes e-Buy to respond to such opportunities posted on e-Buy by GSA or by our customer agencies. Our network of Customer Service Directors and Client Services Directors utilize GSA e-Buy to facilitate sustainable buying for our customer agencies through market surveys, sources sought notices, and requests for information. More outreach to our customer agencies can be done here in an effort to utilize GSA e-buy to request sustainable products and services. Accordingly, our customer agencies can incorporate their own environmental requirements by adding specific technical requirements and evaluation factors at the delivery order and/or task order level. Agency specific sustainable BPA's could also be established against the terms and conditions of a MAS contract, but require only those vendors who can provide sustainability products and/or incorporate product life cycle considerations. Agency specific BPAs, other than office supplies, could be driven by our Customer Services Directors and Client Service Directors.
- ❖ **GSAXCESS¹⁴** is a web-enabled platform that eligible customers can use to access all customer functions such as reporting and selecting property. Customer agencies seeking property can avoid the cost of new procurements by acquiring the same or like items reported as excess by another federal activity and therefore, promote the use of recycled and reused products.

GSA's Property Utilization, Donation and Sales Team educate customers on the recycle/reuse concept to promote "end-of-life" use of government-purchased items. Using a system of internal or interagency transfers facilitated by the online GSAXcess items can be reused within all levels of government, including state agencies. Following protocol, the teams can then sell or auction to the general public, often returning a portion of the proceeds to the original owning agency. Finally, the team can either donate to an approved non-profit organization or attempt to use a network of recyclers to assure all procurements are broken down and repurposed. By use of this process, Region 9 Personal Property Management Division diverted \$504 million worth of Federal property from landfills in FY12, including:

¹³ GSA, eBuy. <http://www.gsa.gov/portal/content/104675>.

¹⁴ GSA, GSAXcess. <http://www.gsa.gov/portal/content/100733>.

- \$485 direct reuse through either donation or direct agency transfer
- \$5 million donated via the Computers or Learning Programs
- \$19 million sale of surplus personal property

SUSTAINABLE FACILITIES TOOLS

- ❖ **GREEN PRODUCT COMPILATION¹⁵** - The Green Products Compilation (GPC) is designed to facilitate the procurement of green/sustainable products and services. The products listed are those for which the EPA, DOE, or U.S. Department of Agriculture (USDA) has issued designations or otherwise provided guidance for environmental or energy attributes. This interactive tool consolidates and organizes information from the federal green purchasing programs in one place, saving one from researching multiple web sites. Designated green products include but are not limited to: building construction, building interiors, landscaping, non-paper office products, cleaning products, and refrigeration and air conditioning.
- ❖ **GSA'S CARBON FOOTPRINT TOOL¹⁶** - The Carbon Foot Print Tool is an online tool available for federal agencies to compile and report their annual comprehensive GHG inventory, as required by Executive Order 13514, and track progress towards achieving GHG reduction goals. FAS Customer Service Directors provides extensive outreach and training on green products and services to all Federal, State, and Local Government customers. PSB's Client Solutions has developed an Enterprise Account Management program which can be used to promote this tool as well as the Carbon Foot Print Tool. GSA's Supplier Management IOAs further promote the use of these tools by sharing the resource with our vendor community in effort to help vendors and industry partners determine whether or not their products qualify for environmental designations.

VENDOR OUTREACH

Currently our vendors and industry partners rely heavily on GSA, EPA, DOE, USDA, and other environmental informative websites to understand the federal government green purchasing requirements.

Currently, MAS contractors are introduced to the sustainability effort through a New Contractor Orientation (NCO), through their Contractor Assistance Visits (CAVs), and through resources available

¹⁵ GSA, Green Products Compilation. <http://www.gsa.gov/portal/content/198257>.

¹⁶ GSA, GSA Carbon Footprint Tool. <http://www.gsa.gov/portal/content/162265>.

on the Vendor Support Center (VSC)¹⁷. The VSC website is a one-stop resource to help GSA's commercial partners succeed in the Federal Government Market Place. Sustainability resources available on the VSC include information about what "GSA means by Green", and PowerPoint Presentations discussing the federal green purchasing requirements and GHG emissions. On the VSC, Supplier Management also publishes the quarterly GSA Steps Newsletter, which contains a section dedicated to disseminating new information on various sustainability related topics to vendors. There is a project underway to add an "All Things Green" portal to the VSC. This platform will consolidate the sustainability information and provide vendors with the information and resources needed to get started and learn how it applies to their products and/or services. The platform further provides information on the identification of environmental attributes on GSA Advantage, GHG emissions, environmental requirements, and links to other resources (i.e. GSA Interact, GSA Advantage, and GSA's website). Perhaps further information can be added to the VSC to promote life cycle analysis/assessment considerations into their activities that affect the environment.

In addition to the VSC, our MAS and Supply Contractors are subject to Contractor Assistance Visits (CAVs), which are conducted by their assigned IOA. The purpose of the MAS CAV is to clarify the terms and conditions of the contract, assist the contractor with their questions and/or concerns, identify potential problems, gather contractor performance data, and to verify the contractor's processes to include but not limited to: their sales tracking system, compliance with country of origin requirements, compliance with their basis of award, and compliance with environmental indicators. The IOA further educates the contractor and provides marketing resources. More marketing and sustainable training needs to be incorporated into these visits. The purpose of the Supply CAV is to also clarify the terms and conditions of the contract and to make sure the contractor is complying with specific terms such as but not limited to: country of origin, item purchase descriptions, and marking and packaging requirements.

The IOA supports the acquisition team by providing the contractor education on their MAS contract or supply contract. The IOA further provides an independent, objective evaluation of a Contractor's compliance and further provides report documentation to the Procurement Contracting Officer (PCO) of the contractor's current performance under the contract. After the contractor assistance visit report (CAVR) is written, the report is reviewed and a report card is issued by the contractor's Administrative Contracting Officer (ACO).

IOAs also perform Pre-award Assessment Report (PAR) inspections for various global supply items and special-order vehicles. These PAR inspections are a collaborative mechanism for rendering Responsibility Determinations on Offerors. The IOA and the ACO evaluate the Offeror's capability by gathering, analyzing, and providing data pertaining to capacity, quality, special contractual

¹⁷ GSA, Vendor Support Center. <https://vsc.gsa.gov/>.

requirements, and past performance. The PAR findings are submitted to the PCO, who determines whether or not the Offeror meets high enough standards to merit an affirmative determination and responsibility. As sustainability requirements are incorporated into solicitations, IOAs have the ability to evaluate each Offeror's claim of compliance with environmental requirements as well as other evaluation factors prior to contract award if a PAR inspection is performed.

COLLABORATION

Collaboration implemented by GSA in an effort to bring government, industry, and our vendor community together is crucial to the success of meeting our environmental mandates. Recently, GSA launched its Sustainable Supply Chain Community of Practice¹⁸ (SSCCP), which brings government, industry, associations, non-profit and academic institutions together to achieve more sustainable supply chains. We need to promote its use internally, with our customer agencies, and with our vendors. We also need to track its success. Another tool in place is GSA Interact. GSA Interact¹⁹ is an open collaborative community for connecting, communicating, learning and engaging across all GSA topics. Its community supports a GSA Sustainability Forum, which is the business driver for Federal sustainability and the matching of customer needs with market availability. It further provides training for both federal government and industry. Region 9 aims to further promote its use and track its progress.

¹⁸ Data.gov, Sustainable Supply Chain. <http://www.data.gov/supplychain/community/supplychain>.

¹⁹ GSA, Interact. <https://interact.gsa.gov/interact>.



3.2.4 WORKPLACE TRANSFORMATION

Workplace Transformation is the process of employing design techniques and technology to literally tear down walls and restructure organizational relationships by reconsidering the traditional spatialization of managerial hierarchies. After deploying Needs Assessment Checklists to customer agencies, Region 9 has undertaken a number of Workplace Transformation pilot projects with the overarching goal of space optimization. Additionally, the Workplace Transformation team has developed and maintains an extensive tool library. Successful strategies from these pioneering efforts will be gradually deployed throughout the region. Workplace Transformation is critical to achieving overall 2020 goals and will be driven at all levels through business case development and enterprise account plans.

COMPLETED WORKPLACE PROJECTS:

Region 9 has completed the following mobility models that showcase the role GSA can take in leveraging mobility and real estate to support the Administration's goal of transforming government:

❖ REGIONAL ADMINISTRATOR AND SENIOR LEADERSHIP COLLABORATIVE WORKPLACE San Francisco, CA



Figure 2

Regional Leadership Collaborative Workspace

The Pacific Rim Regional Administrator, FAS and PBS Regional Commissioners, and their direct reports gave up their private offices and moved into an “open” collaborative workplace environment pilot. The pilot had several objectives:

- Promote change within the region and foster the creation of an enterprise-wide, collaborative leadership team;
- Assist senior management to lead the organization by example and demonstrate the benefits of an open workspace;
- Prepare the region for new office standards in the upcoming move to 50 UN Plaza; and
- Offer a living workplace to customers and encourage their adoption of similar programs as they address their workplace needs.

The space layout and furniture selection of the pilot environment provide support for various working styles. Team opportunities are supported by a collaborative center island and mobile work surfaces. Each workspace has improved access to natural daylight and exterior views, is equipped with mechanisms to mediate noise, and features new developments in desktop organization. Converted from former private offices, small meeting spaces cater to privacy needs during meetings. The implementation of wireless technology throughout further offers enhanced mobility for both permanent and visiting employees. This pilot project has supported the following results:

- Number of workstations increased from 17 to 21 within the same footprint
- Workplace PMO Design score of 79
- Annual space savings: 43%
- CO2 Reduction: 66% (0.92 Metric tons CO2/yr)

❖ BUDGET & FINANCIAL MANAGEMENT DIVISION SPACE REALIGNMENT

450 Golden Gate Avenue, San Francisco, CA

The new BFMD space was designed to promote collaboration and to allow for touchdown desks for visiting staff. New height-adjustable desks were selected to provide a more interactive environment while promoting healthy workplace practices. Additionally, a shared team room was included for ad hoc meetings and privacy when needed. This space reconfiguration aimed to:

- Improve the occupants' space utilization and create a more collaborative environment;
- Test new furniture and design layouts;
- Enhance the use of natural light ;
- Increase collaboration space for the teams; and
- Improve the Workplace PMO Design Scorecard from 36.5 to 76.5.

❖ REAL PROPERTY DISPOSAL SATELLITE OFFICE FURNITURE RECONFIGURATION

Auburn, WA

The redesign of RPD's space sought to provide a more inviting and efficient work environment. Workstations and storage space were downsized and realigned to increase space utilization and circulation. Partitions were lowered to increase the depth of natural daylight penetration while maintaining privacy. This space reconfiguration successfully aimed to:

- Improve the occupants' space utilization;
- Implement a new furniture and design layout; and

- Promote cross-organization collaboration between R10 FAS, the furniture excess program, and GSA IT.

ONGOING WORKPLACE PROJECTS:

With the completion of three successful pilot projects, Region 9 is currently incorporating increased sustainability through strategic workplace and design efforts with the following clients:

❖ SOCIAL SECURITY ADMINISTRATION

Frank Hagel Federal Building, Richmond, CA

Strategic workplace engagement will enable and support the client's ever-changing and improving operations. It is intended that these recommendations will dovetail with the facility's three-phase prospectus project, currently on hold pending funding.

❖ DHS IMMIGRATION AND CUSTOMS ENFORCEMENT

Edward J. Schwartz Federal Building, San Diego, CA

Region 9 developed a workplace strategy and follow-on DID/CDs for the consolidation of three leased offices and existing federal office space into the new Schwartz Federal Building. The three-part effort aims to reduce ICE's leased real estate and right-size their requirements in federal space, reduce operational costs by improving the agency's space efficiency and provide for the development of a furniture specifications package in support of the strategic engagement.

❖ GENERAL SERVICES ADMINISTRATION

50 United Nations Plaza, San Francisco, CA

GSA's Regional staff are re-purposing and relocating to historic 50 United Nations Plaza, a soon-to-be completely renovated and seismically upgraded building in San Francisco's Civic Center. Staff mobility and collaboration will be increased with a fully-open plan. This major renovation project expects to achieve LEED Platinum status and incorporate efficient space planning and the partial re-use of existing furniture inventory.

❖ UNITED STATES GEOLOGICAL SURVEY

Science Campus, Flagstaff, AZ

A program of requirements has been developed out of a strategic workplace engagement study to consolidate three leased facilities within USGS' Flagstaff Science Campus. This effort is expected to assist USGS in improving their utilization rate by incorporating innovative programming in an open floor plan. This plan hopes to achieve a more collaborative office environment with shared lab space and potentially establish more efficient standards that may be used in other regional facilities across the country.

❖ HEALTH AND HUMAN SERVICES, OFFICE OF MEDICARE HEARINGS & APPEALS

Irvine, CA

Region 9 has developed strategies and space requirements that will consolidate employees through workplace design and mobility initiatives to meet the new DOI space utilization requirement. This effort will serve to meet the Region 9 HHS space reduction requirement, and likely influence three other HHS-OMHA offices around the country.

❖ DEPARTMENT OF HOMELAND SECURITY, CUSTOMS AND BORDER PATROL

Tucson, AZ

Region 9 is currently promoting strategic workplace engagement to improve space utilization and capitalize on an expiring lease. This approach is intended to provide standards for other CBP locations.

❖ UNITED STATES GEOLOGICAL SURVEY

John E. Moss Federal Building, Sacramento, CA

Using workplace strategies in conjunction with more traditional space planning efforts, GSA is back-filling federal vacant space at Moss Federal Building with employees from USGS' administrative offices currently in delegated lease space at Sacramento State University.

ONGOING INITIATIVES

In addition to space projects, Region 9 has been furthering a number of initiatives around workplace habits, influencing issues from daily commuting patterns to the digitization of information. The current status of Region 9's major initiatives is as follows:

- ❖ TELEWORK

12.1% of Region 9 PBS hours teleworked in FY12.

- ❖ TRAVEL

Region 9 travel in FY12 decreased 50% from FY11. Stricter controls on travel have compelled Region 9 to re-evaluate its processes for remote performance; significantly, most of the MARS review process is now performed virtually under a completely new format from previous years.

- ❖ TELEPRESENCE

Region 9 is categorized in the High Usage category for telepresence participation as reported by Central Office. Employees are engaging in the telepresence tools which are effectively bridging the gaps created by less travel.

- ❖ ALTERNATIVE WORK SCHEDULES

AWS continues to prove successful. Each working group manages schedules directly, thereby increasing the ability to balance team presence with AWS and telework.

- ❖ PRINTER CONSOLIDATION

Region 9 has effectively eliminated Regional Office desktop printers and consolidated to centralize printing.

- ❖ DATA CENTERS

The identification and consolidation of data centers is pending the Central Office Inventory and Consolidation Plan.

- ❖ DIGITAL DOCUMENTATION

Several divisions have instituted internal programs for digital documentation, and significant progress has been made toward using Electronic Document Management System (EDMS) at a regional scale. In support of this effort, Legal and Contracting divisions are investigating ways to decrease requirements for hard copy documentation.



3.2.5 SUSTAINABLE COMMUNITY AND OUTREACH

Sustainable Communities is a focus area intended to inspire a collective capacity to implement and strengthen sustainable approaches throughout the Pacific Rim Region. Potential collaborators include; state and local agencies, non-profit organizations, educational institutions, private industry, etc. Roundtables are currently being held to lay the ground work for this effort and an advisory council is being considered to formalized and provide a stronger platform for exchange between participants.

In addition, sustainable efforts and the transformation of culture within GSA will be synergized through the use of Sustainable Communities. By providing a forum, Sustainable Communities will bring together various efforts in support of sustainability within the region

COMMUNITY AT LARGE

Sustainable Communities is a focus area that will leverage industry expertise, market influence, and relevant stakeholders to proactively promote sustainability in the communities where we live and serve. Until recently, leveraging of networks and sharing of best practices have been typically conducted on an ad hoc basis.

Region 9 has begun participating in community-led ‘roundtables’ to learn from the sustainable practices of innovative thinkers in private industry, GSA, and the government at large, with the ultimate goal of integrating sustainable design into GSA’s *processes* and deliverables. These pilot roundtables are laying the groundwork for how we will successfully engage stakeholders throughout the community to partner and share in our efforts. This will potentially manifest into an Advisory Council currently under consideration.

WITHIN GSA REGION 9

Tools created and/or implemented in an effort to create sustainable communities are often segmented along service lines. While there are many efforts at national and regional levels to provide various sustainable tools and programs, they often fail to gain traction for universal use or implementation. Furthermore, the cultural shift required to substantiate sustainability as a fundamental tenet of behavior and operations has yet to be fully realized.

Using the National Green Team Guideline, a re-evaluation of the structure and depth of Green Teams has begun throughout the region. Building-level teams have formed with agency partners leading the way. The Regional Green Team is also embracing the guidelines and currently realigning its efforts. Additionally, the Regional Office has created a Sustainability Council modeled after the national example.

Although this is a “future state” responsibility, it is important to note the Council, along with its other chartered responsibilities, will be the official reviewing body and provide cross-service guidance between PBS and FAS for this Regional Plan.

How we engage occupants within our buildings is also a critical component. GSA has spearheaded a successful tenant engagement program for the move to 50 United Nations Plaza (due to finish in November 2013). Using this knowledge Sustainable Communities will leverage this experience to create a larger, far-reaching Tenant Engagement Outreach Program intended to transform culture and promote sustainable behavior.

There is a strong need to develop an educational component that will support and advance the outreach and the transformational change required. Region 9 is currently evaluating and formulating recommendations in this area. Due to financial constraints, education has been primarily allocated to the maintenance of mission-critical training (e.g., contracting officer warrants, professional designations).

3.3 KEY PERFORMANCE INDICATORS

3.3.1 OVERALL DOLLAR SAVINGS

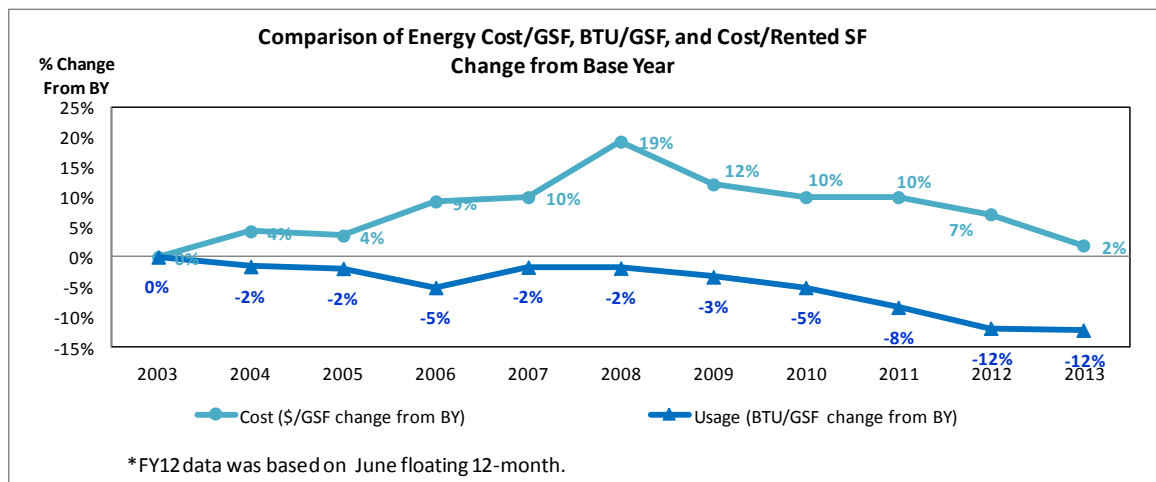


Figure 3
R9 Energy Trends 2003 - 2013

Since baseline year 2003, Region 9 has seen an increase in total utility costs by 12.8%.²⁰ However, it is important to note that this cost increase comes alongside a 5% increase in gross square footage and a 6% decrease in total energy use. These trends in unison suggest that the increase in cost stems not from a decline in energy efficiency but from an increase in cost of the energy units themselves – a factor exogenous to our regional performance.

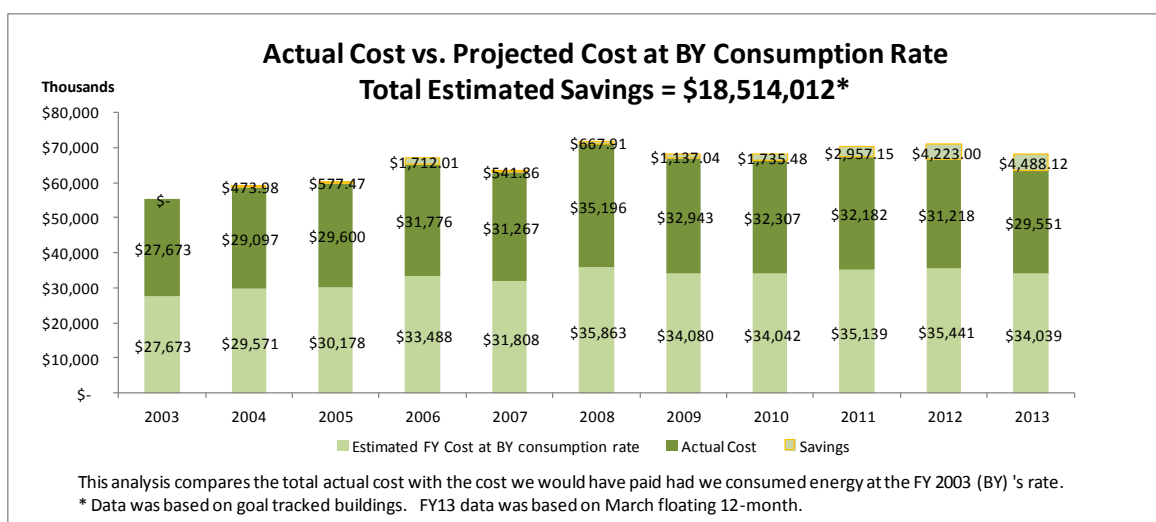


Figure 4
R9 Costs and Savings 2003 - 2013

²⁰ Appendix B

Accordingly, though our total costs have increased since the base year, Region 9 has, in fact, saved \$4.5 million in utility costs in FY12 alone as compared to our cost projections made at the start of each year. In sum, Region 9 has saved over \$18 million since FY03. This can be partly attributed to the conservation measures implemented across the region.



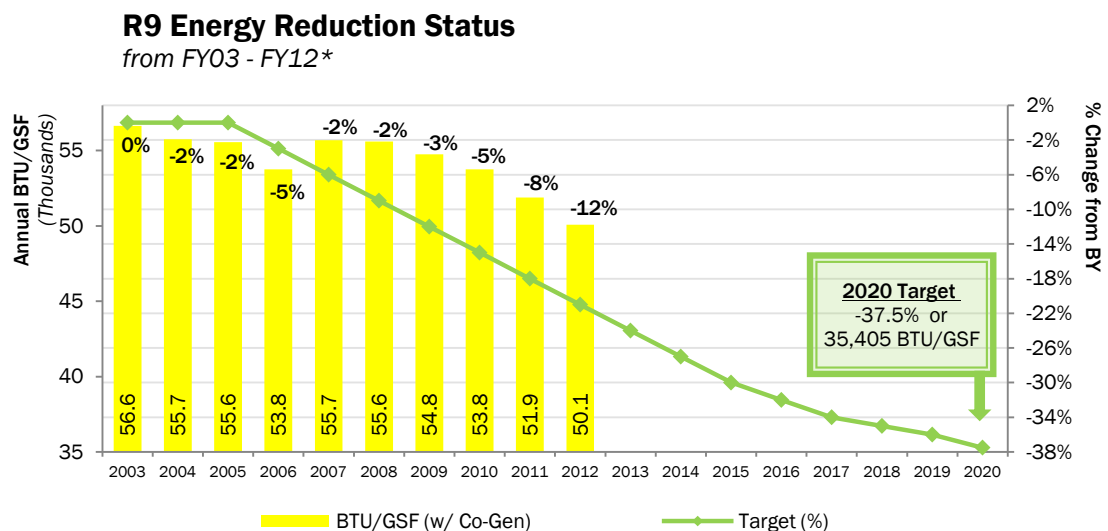
Figure 5

Chet Holifield PV Array

3.3.2 CLEAN POWER

Region 9 produces over 6 megawatt hours of renewable energy per year through its photovoltaic (PV) installations. This is the energy equivalent to powering 357 homes in the United States for a full year. Seven additional PV installations have been under consideration for implementation in Region 9 via ARRA, and if successfully brought on line will produce an additional 5.4 megawatt hours of renewable energy per year.

3.3.3 ENERGY REDUCTIONS



*Data includes only building category A, C, and I. Source Use Credits were accounted for in the data.

Figure 6
R9 Energy Reduction Status

As of Q3 FY2012, Region 9 has seen a 12% reduction in energy use per gross square foot as compared to rates in FY03. Via this audit and the Regional Plan, Region 9 intends to make or exceed

the 37.5% overall energy reduction target by 2020 as identified in the National Plan. While Region 9 saw a one-time decrease in energy efficiency in FY06 that put the region under current long-term performance trends set by the National Plan, it is important to highlight that Region 9 has performed increasingly well since then, surpassing the 3% annual target for FY12 with a 4% reduction in energy intensity.

However, Region 9 faces several challenges that will likely preclude meeting the interim 2015 target of 30% reduction in energy use and intensity. Aside from increased utility rates impacting potential regional cost savings, Region 9's portfolio is likely to remain larger in gross square footage at the interim target date as compared to FY03. Furthermore, while it is important to reduce our physical footprint through workplace transformation²¹, it is inevitable that the densifying of employees in smaller spaces will increase energy intensity numbers per *usable* square foot – the impact of which on gross square footage is yet to be determined. As such, it is imperative that energy conservation measures continue to be implemented to battle increased consumption during this adjustment period.

3.3.4 GREENHOUSE GAS EMISSIONS

Since base year 2008, Region 9 has reduced Direct GHG emissions by 9%.²² This reduction can likely be attributed to renewable energy projects with no emission impacts. Indirect GHG emissions have yet to be determined as they are not currently internally measured.

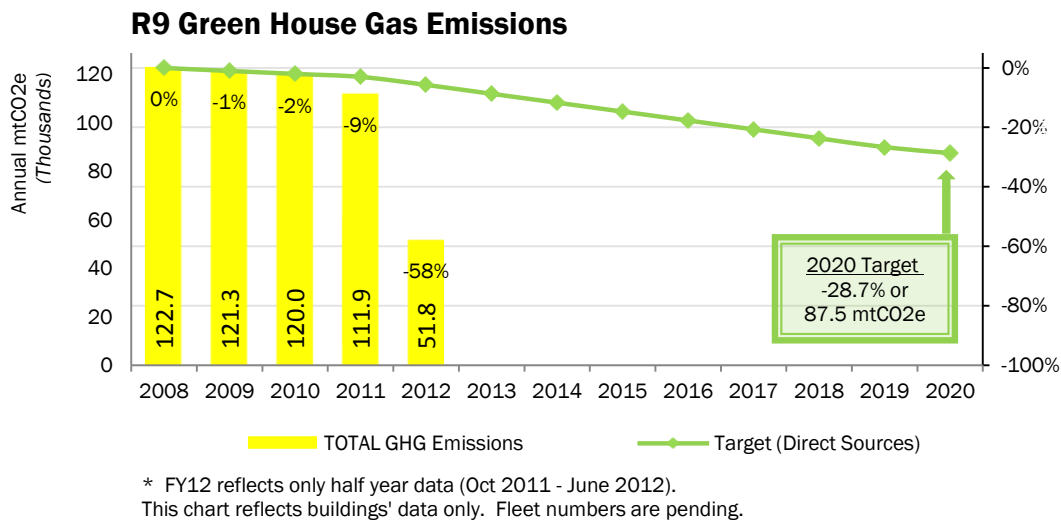


Figure 7
R9 Greenhouse Gas Emissions Status

²¹ Presidential Memorandum. <http://www.whitehouse.gov/the-press-office/presidential-memorandum-disposing-unneeded-federal-real-estate>

²² Appendix D

3.3.5 WATER REDUCTIONS

As of Q3 FY12, Region 9 reduced total water usage by 10% from base year 2008. As reported by the National Energy and Water Management Center (NEWMC), Region 9's water consumption results have consistently earned satisfactory rating until a drop in performance in October 2011. This increase in water consumption can be attributed to water system leaks and construction-related flush-outs required by ARRA projects. 23 of 68 buildings included in the measure achieved the 2% annual reduction target in FY12, but it will be difficult to make a worthwhile projection of performance until ARRA projects have concluded.

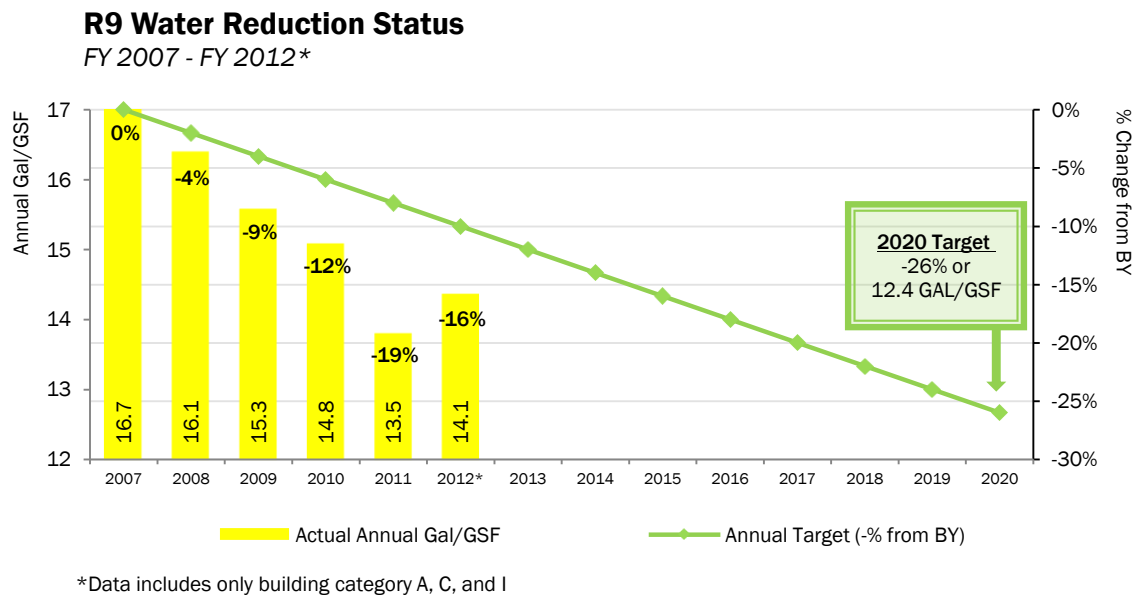


Figure 8
R9 Water Reduction Status

3.3.6 WASTE

Measurement and tracking of waste diversion in Region 9 began in 2010. During FY11, 1,786 tons of waste was diverted from landfills. In FY2012, Region 9 diverted approximately 2,963 tons of material, an increase of 1,177 from the previous year. The current waste diversion rate is 61% already exceeding the goal of 50% diversion by 2015. The Region 9 waste management programs crosses various functional areas and includes plans to engage the Environmental Protection Agency and to educate our employees and tenant agencies.

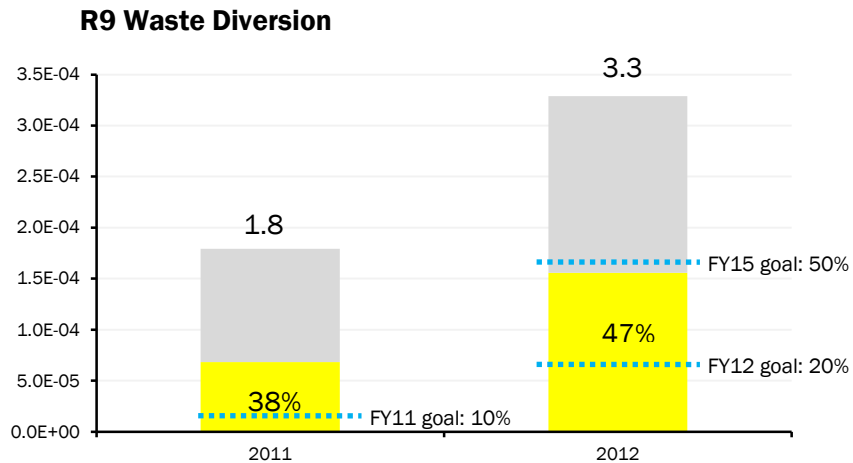


Figure 9
R9 Waste Diversion

Information Technology program managers and procurement officers have worked closely with the waste diversion and personal property teams to secure electronic products that lend themselves to longevity and efficient recycling. The renewed assessment of a product's complete life cycle is intended to help identify and mitigate our overall footprint on larger supply chain movements. Nascent plans are also in development to track total e-waste results as part of the overall regional strategy. During the last e-waste event, Region 9 salvaged approximately eight tons of electronic equipment and over 600 ink/toner cartridges.

The Personal Property Management Utilization, Donation and Sales team uses a system of internal or agency transfers, facilitated by the online XCESS system, to promote the reuse of items within the Federal government. In FY12, the Personal Property Division developed an internal goal of 99% diversion, ultimately achieved by reutilizing, recycling or diverting \$504 million worth of items, including \$100 million diversion to state and local agencies, and \$5 million to the Computers for Learning program.

3.3.7 TENANT SATISFACTION

In FY12, Region 9 achieved a 77% tenant satisfaction rating. While our performance did not meet the Linking Budget to Performance (LB2P) target of 80%, Region 9 did in fact surpass the rest of the nation in this measure. As the introduction of more complex conservation measures and projects alter work environments and daily operations, the region anticipates noticeable fluctuations in tenant satisfaction in the short-run but hopes that more comfortable and innovative workplace solutions will ultimately levelize the measure at a much higher rating.

4.0 FUTURE STATE

Where We Want to Be

"We have to reform our government so that it's smarter, leaner, and better able to take on the challenges of the 21st century."

- Winning the Future (<http://www.whitehouse.gov/winning-the-future>)

Becoming smarter, leaner, and better requires a significant level of transformational planning and action. Our approach included conducting a comprehensive analysis of the current state of operations, policies, and procedures, distilling what the Future State could look like (this section) and providing a roadmap for how we get there (see Section 5 Strategies).

The National Plan provides the foundation for Regional Plan. GSA Regions' proximity to customers and the ability to access state and local networks create efficiencies for sustainable efforts. Using the National Plan goals and targets, Region 9 has developed strategies given the current state and other geographical, political, and social factors. As one of the key performance indicators, greenhouse gas emission reductions cross all five focus areas and will be tracked and reported.

In short, the Future State for Region 9 will include: institutionalizing sustainability as a common thread throughout operations, providing transformational change within the Federal Government, and building the larger sustainable community. The following pages provide a high-level view of what Region 9 could look like in 2020 and beyond by focus area. (For details on how we will accomplish the Future State, see the Roadmaps for Strategic approaches).



4.1 BUILDINGS

DRIVING GOALS

- **ENERGY** - All building projects and utilization will be designed to meet energy intensity reduction goals of 37.5% by FY20 (actual goals to be determined building-by-building).
- **WATER** - All building projects will result in a reduction of potable water use by 26% by FY20.
- **WASTEWATER** - By FY20, GSA will reduce Scope 3 GHG emissions attributed to contracted wastewater treatment by 5% (baseline FY08).
- **GHG** - All buildings projects and programs will have a significant role in the reduction of Greenhouse Gas (GHG) 28.7% by 2020 (baseline FY08)
- **WASTE** – By FY20, Region 9 will reach 75% waste diversion and achieve a reduction of Scope 3 greenhouse gas emissions by 43.9% (baseline FY08). A comprehensive end-of-life e-waste plan will compliment the Supply Chain e-waste program.
- **RENEWABLE ENERGY** – By FY20, Region 9 will increase renewable energy production and procurement to 30% of annual energy consumption.
- **NET ZERO** – All new construction project will use net-zero as a standard benchmark by FY30.
- **METERING** – By FY16, all applicable buildings will have advanced meters for gas, steam, electricity, and water (including mechanical systems) installed.
- **GUIDING PRINCIPLES** - Greater than 18% of GSA's owned and leased inventory (greater than 5,000 gross square feet) will incorporate sustainable practices found in the Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings.

INTEGRATED PROCESS

- **INTEGRATED APPROACH** - GSA's path to sustainability begins with embracing an integrated approach to all projects. Once the integrated design approach is institutionalized, sustainable practices will infuse all facets of building management and project development. Emphasis on alignment with Workplace Transformation focus area is key.
- **WHOLE BUILDING APPROACH** - Sustainability will be acknowledged as a fundamental guideline, rather than as a possible addition, for all building considerations. Whole building design will represent a pivotal shift providing for incremental considerations of building

elements to reduce costs and time and move to a model in support of larger sustainable targets. A deep understanding of each building will be realized and integral to our decision making process through an established Sustainable Buildings Team. ²³

- **COMMUNITY AT LARGE** - GSA will lead the private sector in new innovation by incorporating sustainable strategies into each project and leverage our ability to drive markets and partner with all levels of stakeholders.
- **PROGRAM ALIGNMENT** - The Regional Green Proving Ground Program fits into the GSA Green Proving Ground portfolio as an extension and complementary partner in accelerating the adoption of emerging green building technologies.

BUILDING-BY-BUILDING

- **MONITORING AND DIAGNOSTICS** - Building level management will be empowered to make sustainable choices using real-time data and dashboards produced by advanced building automation systems (BAS) coupled with monitoring and diagnostic systems
- **RISK MANAGEMENT** - Pending Climate Adaptation Plan (working with R11) and industry projections, GSA will leverage energy conservation and production strategies as well as water conservation and retention to best position for potential increase in costs and resource availability. Maximum levels of energy and water self-sufficiency will be achieved through the use of a building-by-building plan which includes locality analysis.
- **SPACE EFFICIENCY**- Increase density in Federal Buildings and dispose of excess or underutilized buildings: consolidate space, improve space utilization, increase telework participation, workplace design solutions, and disposal of excess or underutilized buildings.
- **OPERATIONS** - In 2020, the operations and maintenance of all buildings will be managed to optimize sustainable strategies. These strategies will keep pace with the rapid changes in building technology, building management practices, and sustainable efficiencies. The contractors responsible for maintenance, as well as GSA building management, will be given the tools and be highly trained to achieve this end goal. Operating plans will be optimized to achieve the greatest benefit for both tenant satisfaction and Regional Plan savings.

²³ Appendix G

OVERARCHING

- **PROJECT EXECUTION AND ENHANCING SERVICES** - Project standards will be elevated to meet the rising demand of optimizing sustainable strategies. Streamline process for getting on GSA schedule will result in GSA securing top industry firms at the best value for the taxpayer's dollar.
- **GREEN PROVING GROUND AND PILOT PROJECTS** - Region 9 will continue to pursue Green Proving Ground projects, pilot programs, and sustainable initiatives feasible. Four BuildingLink pilot projects will be completed and expansion contingent on the analysis of their performance.
- **CONTRACT SERVICES** - GSA contract services will possess a complete understanding of the Regional Plan's goals and strategies and drive sustainability in all contract actions. Projects will utilize power purchase agreements and other financial vehicles for investments in photovoltaic, fuel cell, turbines, and innovative technologies (e.g., seawater chilling systems) where applicable.

4.2 TRANSPORTATION



DRIVING GOALS

- FLEET REDUCTION – Decrease GSA-owned fleet by 6%.
- MARKET SHARE - Increase overall market share among GSA and Federal Customers to 48% by developing partnerships with all customers in the achievement of our national fleet goals.
- CUSTOMER SERVICE - All agencies using fleets profiled and tracked.
- FUEL REDUCTION - Reduce gasoline and diesel use by 30%.
- FLEET COMPOSITION - 75% of Region 9 GSA fleet will be high efficiency fuel vehicles. 30% of Federal Region 9 fleet will be high efficiency vehicles.
- ALTERNATIVE FUELS – By 2015, increase consumption of alternative fuels by 159% from FY09 levels. Green fueling sources (E85, CNG, and electric) will be easily accessible throughout most metropolitan statistical areas.

CUSTOMER-BY-CUSTOMER

- FINANCING – Financing options will be in place to incentivize customers making green fleet choices the standard choice.
- MARKET SHARE – Customer fleet needs will primarily be facilitated by GSA. Innovative approaches such as a car-sharing program will be in full use.
- EDUCATION – All drivers will to drive green through the use of education and outreach programs.



4.3 SUPPLY CHAIN

DRIVING GOALS

- **ESTABLISHING CRITERIA** – Where appropriate, all products in the twenty-five (25) sustainability product categories²⁴ will be reviewed from a reuse/diversion perspective by regional personnel from both FAS and PBS.
- **E-WASTE PROGRAM** - Where appropriate, all electronic products offered through the various GSA procurement vehicles will be evaluated from an e-Waste perspective by regional personnel from both FAS and PBS in an effort to support national efforts to lay the groundwork for improving the design of electronic products and enhancing America's management of used or discarded electronics.²⁵
- **LIFE CYCLE ASSESSMENT** - All products in the twenty-five (25) sustainability product categories will be reviewed from a life cycle perspective.²⁶
- **CONTRACT ACTIONS** – At least 95% of new contract actions in support of GSA operations and using GSA funds will require the supply or use of environmentally preferable products and services.

OVERARCHING

- **GREEN PURCHASING PORTAL** – With the Green Purchasing Portal, GSA will provide an easy-to-use, comprehensive purchasing path for selecting cost-effective, highly-sustainable products. It will allow for comparison of products by financial, sustainable, and LCA value propositions and provides an ability to track and optimally assist customers while working in concert with the Sustainable Facilities Tool.
- **CUSTOMER EXPERIENCE** – Region 9 will assist 100% of our customers to meet our national goals. Region 9 will practice full collaboration with our customers to reach their goals and provide well designed education programs to support sustainable choice. Enterprise Account Planning will provide a streamlined consolidation of services (including supply chain), thus producing a superior customer experience.

²⁴ Appliances, Building Finishes, Building Furnishings, Cafeteria Products, Cleaning Products, Construction Materials, Contracted Printing Services, Doors and Windows, HVAC and Mechanical, Landscaping, Lighting and Ceiling Fans, Lube, Oil, Hydraulic Fluid, & Grease, Miscellaneous, Non-Paper Office Products, Office Electronics, Paper Office Products, Park and Recreation, Personal Care, Plumbing Systems, Refrigeration and AC, Renewable Energy, Roadway Construction, Special Construction Products, Traffic Control, and Vehicle Products.

²⁵ GSA, eWaste Task Force. <http://www.gsa.gov/portal/content/234565>.

²⁶ EPA, Life Cycle Assessment. <http://www.epa.gov/nrmrl/std/lca/lca.html>.

- **VENDOR OUTREACH** – Our vendor community will be fully trained in federal green purchasing requirements and sustainable practices. A fully developed vendor compliance program with environmental requirements and the proper identification and reporting of green products and services will be in place. A program is currently in place for the marketing of sustainable products and services. Supplier Management and Customer Accounts Research are working together to enhance customer agencies and sustainable vendors understanding and relations.
- **DRIVING MARKETS** – GSA will be at the forefront of market transformation by leveraging all market players such as the distributor, manufacturer, small business, and large business. Procurements will be customized to maximize opportunities to improve sustainability.
- **NATIONAL DRIVERS** – Various national-level efforts are underway to increase green services and products. Region 9 is a key partner in the development and institutionalization of these efforts.



4.4 WORKPLACE TRANSFORMATION

DRIVING GOALS

- **PORTFOLIO UTILIZATION** - Reduce Portfolio size by 30% by increasing density through workplace transformation. Aggressively align with Real Property Disposal to achieve optimized energy savings via direct reduction in conditioned space. A reduction of Region 9 federal footprint by 9.2 million RSF will yield cost savings in rent and maintenance of approximately \$202 million per year.
- **FUNDING** - Workplace transformation will be considered in all projects, whether RWA or GSA funded, that involve changing occupant working areas

OVERARCHING

- **SUPPORTING PROGRAMS** - GSA will reach a maximized level of use of AWS, telework, telepresence to support workplace transformation initiatives.
- **PROGRAM DEVELOPMENT** - In 2020, GSA will have developed a full suite of sustainable solutions to promote adoption of workplace transformation.
- **CUSTOMER EXPERIENCE** - Develop customer-facing hubs that allow inter-agency sharing of resources, including space and infrastructure, to result in cutting of costs and increased ease for public to access services. Enterprise Account Planning will provide a streamlined consolidation of services (including Workplace Transformation), thus producing a superior customer experience.

4.5 SUSTAINABLE COMMUNITY



INTEGRATED PROCESS

- **INDUSTRY OUTREACH** – Exchange information with industry through participation in professional associations, industry conferences, roundtables and other appropriate forums.
- **TRIPLE BOTTOM LINE** - Define the outline for GSA's social, economic, and environmental operations, which will lead the agency to achieve our sustainable goals.

OVERARCHING

- **COMMUNITY OUTREACH** - Align with the trend toward sustainable efforts focused at the state and local level. Specific examples include state led fueling stations initiatives and city-level district greening efforts (e.g. San Francisco's sustainable district project and 50 United Nation Plaza). Capitalize on GSA's unique ability to scale given individual program focus.
- **INTERAGENCY OUTREACH** – Develop an interagency coalition to leverage federal programs, purchasing opportunities with local municipalities' greening efforts, federal idea-sharing and promotion of GSA green programs with our customer agencies.
- **BUSINESS CASE DEVELOPMENT** - Lead the market for example projects and programs by sharing business cases and lessons learned.
- **DRIVE PROGRAMS** - Align with all GSA and other Federal Agencies' national-level programs (e.g., Federal Green Challenge).
- **DRIVE MARKETS** - Develop relationship strategies to drive sustainable markets and lead by example.
- **EDUCATION** - Formalize education and training for implementation of national strategies.
- **CUSTOMER EXPERIENCE** - GSA will have an active engagement program which will incentivize customers and continue to promote sustainable initiatives.

5.0 STRATEGIES

How We Get to the Future State

To successfully achieve the Future State, an incremental approach cannot be used. Overarching approaches have been developed and teams have developed the details of specific strategies, actions and the target dates to accomplish the future state goals. These details comprise the “roadmap” for the Region and are published as the final Phase Three - “Roadmaps” for action.

Strategies have been created using information gathered from: internal divisional breakout sessions with all members of the Region 9 team, multi-disciplinary focus groups, and manager and director workout sessions. These groups focused on a deeper understanding of our contractors and their experiences, and, most importantly, a more comprehensive understanding of our customers.

There are two levels of approach to our strategies found in this section:

Section 5.1 Overarching Approach

Section 5.1 discusses the overarching approaches that will cross four of the five sustainability focus areas.

Section 5.2 Roadmaps

Interactive, digital roadmaps have been developed and are being used to give specifics about the current state, future state and outline the roadmap for discrete strategies and actions by the five focus areas.

5.1 OVERARCHING APPROACHES

Region 9 will employ several overarching approaches across our sustainability focus areas. These approaches will:

- Cross service lines and, when considered properly, be critical to our overall success.
- Include: multi-disciplinary teams, integrated design approach, business case development, enterprise account management, education, comprehensive portfolio assessment, accountability, and funding.
- Use gPM directly and indirectly as the approaches are employed.
- Build upon the Case for Change (Section 2.0).

Detailed plans and target dates are outlined in Roadmaps (Section 5.2).

5.1.1 MULTI-DISCIPLINARY TEAMS



The multi-disciplinary team strategy will use rotating stakeholders from various locations and disciplines throughout the region. The main purpose for these teams will be to provide robust development and support around focused topics. The intent is to eliminate ‘silo’ decision-making and redundant efforts. It should include seamless collaboration between field offices to region, division to division, service to service (PBS and FAS), etc. See Figure 11 for an

example of one of the first multi-disciplinary teams proposed to spearhead better products purchased from reuse and diversion (Waste-focused) standpoints.²⁷

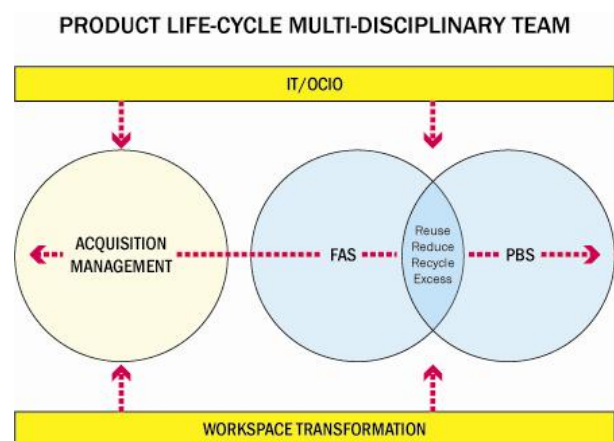


Figure 11
Waste Multi-Disciplinary Team

5.1.2 INTEGRATED DESIGN PROCESS



As found in the High Performance Green Buildings – ARRA Mid-Term Report, August 2012, section 2.3.2:

²⁷ Appendix H

The guiding principles required project teams to “use an integrated design process to establish performance goals for sustainable design principles and develop a plan to ensure implementation of high performance green building goals throughout the project.

Integrated design is a collaborative method that emphasizes “whole building” design. A building is viewed holistically as opposed to an accumulation of its separate components (site, structure, systems, and use).

The method requires multidisciplinary collaboration from conception to completing between many parties. It draws on the knowledge of all the stakeholders across the life cycle of the project, from defining the need for a building, through planning, design, construction, building occupancy and operation.

The most fundamental purposes of the integrated design process are to: 1) look at buildings from a whole systems perspective; and 2) involve all stakeholders throughout project conception to completion and beyond. Benefits from proper implementation can include improved energy and monetary savings on projects and an enhanced stakeholder’s experience. Historically, use of this approach has garnered optimum energy and water saving project elements in a much more proactive way as well as avoidance of costly delays. One particular benefit of GSA projects is the provision of a platform to champion sustainable elements that may otherwise be value-engineered out. The standards and mandates supporting this effort are outlined in the Building roadmaps (see Strategies Section 5.2).²⁸

5.1.3 BUSINESS CASE DEVELOPMENT



Business case development will provide compelling justification for our investments through in-depth analysis of our strategic approaches in the Regional Plan’s five focus areas. This will be critical in two ways: 1) prioritization of sustainable measures for GSA and customer agencies; and 2) analysis of the quality of projects, products and services for funding. For example, from the Sustainable Buildings Multi-disciplinary team, we will be examining the use of Co-generation technology with absorption chillers. As another example, a business case scheduled to be developed using a workplace transformation project to discover the best ways to determine product life cycle assessment.

5.1.4 ENTERPRISE ACCOUNT MANAGEMENT PROGRAM



The Region 9 Enterprise Engagement Program has been established so GSA can assist our client agencies in meeting the President’s memorandum to reduce costs, meet their

²⁸ Appendix G

sustainability measures, provide a 21st century workplace, and to provide overall savings to the taxpayers. This is a collaborative, multi-disciplinary, strategic approach to developing a comprehensive account plan for our client agencies. Through Regional Enterprise Account Plans (REAP) we will define our approach for engaging each customer and analyze aspects of their business, including their existing portfolio, vehicle fleet, supply management, work space, and community relations. This will identify cost effective products to improve sustainability and generate overall savings to the taxpayers.

5.1.5 EDUCATION

E Education is a key component to the Regional Plan's success and the greater professional development that is needed across GSA. Integrated educational programs will be developed for all levels of GSA Region 9 employees, contractors, and customers, and will be built around improving expertise in this Regional Plan's five focus areas. It is important to leverage existing low and no cost programs, and to partner with Central Office to best utilize and support existing and developing national programs. Specifically, the "One Stop Shop" will house the Region 9 "Knowledge Center". This Center will be a centralized method for all employees to see what educational opportunities exist, have input into what is being developed, and be able to relate all actions to the larger Regional Plan. To bring this full circle, Region 9 intends to share the programs developed and sourced to support other regions with driving their own educational programs.²⁹

5.1.6 STRATEGIC PORTFOLIO ASSESSMENT

PA Using a holistic approach, our portfolio will be continually assessed and realigned based on its current status and overall goal attainment. Building-by-building analysis will be performed for sustainable projects and workplace transformation opportunities. Furthermore, all planned projects will be reviewed as part of this analysis to ensure the maximum sustainable benefit is realized and sustainability is an intrinsic part of the project planning and implementation process.

Through the use of this analysis and a developed roll-out strategy, agency reimbursable work orders, alternative financing vehicles, and our own funding will be leveraged to best achieve the goals laid out by the National Plan.³⁰

²⁹ GSA Region 9, One-Stop-Shop. <https://sites.google.com/a/gsa.gov/pacific-rim-sustainability/knowledge-center>

³⁰ Appendix G

5.1.7 ACCOUNTABILITY: REPORTING AND TRACKING



Several unrelated programs and systems are used to track the various aspects of our business affecting this Regional Plan. Accurate reporting and tracking of progress and results are critical to achieving our goals. A key aspect of attaining these goals and, moreover, encouraging associates to make transformational change, is actionable data. Allowing stakeholders to immediately see the impact of their energy decisions empowers them to make decisions that are aligned with our goals. To this end, Region 9 will utilize a dashboard populated with real-time data to inform and coach our tenants, management, and external stakeholders toward improving the sustainability of PBS's real estate portfolio. In its final form, this information will enable our customers to instantaneously adjust their behavior to reduce the environmental impact at the individual and agency level. While building management teams will employ this data to accurately pinpoint issues and effectively resolve them as they occur, our external stakeholders will have access to current and historical performance data in order to make macro-level decisions regarding funding, directives, and new legislation.

PBS has many goals and ways to measure the current state of and progress toward sustainability. As our business becomes more sustainably-focused, it is important to display our progress and current state into a format that can be easily understood and digested. Creating a dashboard that incorporates all facets of sustainability will enable associates to understand this information from a holistic perspective.³¹

5.1.8 FUNDING



5.1.8.1 Buildings Funding



Given that direct funding will be limited, development of alternative financing options (e.g., PPAs, ESPCs) for projects is important to reaching targets and goals. Ongoing research of new funding vehicles will need to be pursued. Additionally, working with utility companies to leverage opportunities, as well as customers, to enhance tenant/customer projects and improve use of potential RWAs is also necessary.

TOOLS AND AUTHORITIES

The top five sources of alternative funding hinge on "multi-year contract authority". This vehicle allows for the occurrence of commitment without full up-front funding; consequently, it

³¹ Appendix A

is assumed that future year appropriations will cover costs. This requires statutory authority. Contracting, project execution and resulting operation and maintenance are key factors to successful alternatively financed projects. Additionally, the challenges of scheduling and, specifically, the ability for FAS to offer funding vehicles to tenant agencies is critical to achieving our energy goals. The tools are as follows:

❖ ENERGY SAVINGS PERFORMANCE CONTRACT (ESPC) AUTHORITY: 42 USC 8287.

This is an explicit authority to engage in financed energy projects with terms up to 25 years, subject to certain restrictions such as: a competitive process; inclusion of vendors on a DOE prequalified list or agency equivalent (there are no agency equivalents in practice); guaranteed coverage of payments through utility and maintenance savings; and demonstrable measurement and verification of achieved savings.

Implementations:

- Indefinite Delivery Indefinite Quantity (IDIQ) programs, most notably the DOE Federal Energy Management Program (FEMP) "SuperESPC" IDIQ. This is FEMP-led program.
- Stand-alone contracts. DOE refers to these as "site specific" although they can include multiple sites. The statute does not require use of any given program, therefore a separate contract can be solicited for a specific requirement.
- Power Purchase Agreements (PPAs). An ESPC (either under an IDIQ or stand-alone) can be structured as a PPA, in essence creating a PPA that meets ESPC statutory requirements.

❖ UTILITY ENERGY SAVINGS CONTRACTS (UESC) AUTHORITY: 42 USC 8256

UESC Authority is a vaguely-written authority allowing agencies to participate generally in utility company programs. It has been generally interpreted as a stand-alone contract authority, but inconsistently - some agencies view it as an elaboration on 40 USC 501(b) (1) (B) rather than an independent contract authority, thus making the term of any financed contract 10 years. The statute does not require a performance guarantee, though one is required by GSA. It is unclear why this is the case. It is also important to consider that not all utilities have associated programs.

❖ EXCHANGE AUTHORITY

The authority for exchange is contained in 40 U.S.C. 3304(a). It authorizes the exchange of Government-owned lands and interests therein for lands owned by States, other non-Federal agencies, and their instrumentalities. As a general rule, any exchange of lands should be restricted to lands of approximately equal value. Where the Government

property proposed for exchange has a value substantially in excess of the private land to be acquired, the question of whether the transaction is truly an exchange arises. In drafting relocation contracts, care must be exercised to insure that there is legal authority for execution of the conveyance or easement proposed.

❖ **PROPERTY ACT UTILITIES AUTHORITY. AUTHORITY: 40 USC 501(B)(1)(B)**

This authorizes GSA (and by extension other agencies under delegations) to enter into legal agreements for 10 years. This has been recognized by Government Accounting Office (GAO) as multi-year contract authority, so financing arrangements can be done. This can be used for PPAs, but the 10 year term is an issue. For all of these, there is currently a defined GSA approval process. Central Office has created an ESPC Program Management Office headed by Sharon Conger with Mark Ewing's (Energy Division) direct support. ESPC PMO and/or Energy Division approval must be sought for all projects.

❖ **LEVERAGE LEASING OPPORTUNITIES**

There are currently no special multi-year contract authorities for leasing. For the Office of Management and Budget to not score a personal property lease (*i.e.*, to allow it without obligating all costs up front), the lease would have to have rights to termination without additional cost to the government in any given fiscal year, and not carry a liability across fiscal years. In practice this makes leasing building fixtures (e.g., light fixtures) not viable, since the lessor would have to absorb costs in the event of an early termination. There may be some potential to use leasing where the asset involved has little installation cost, and can be reused without much loss of value if the lessor has to take it back.

Maximizing the deployment of clean energy technology in our lease buildings requires the need to open alternative finance options through our Schedules. As a specific challenge, PBS has the authority to purchase power off Schedule and FAS does not. A policy change will be sought to alter this Charter/Authority.

5.1.8.2 Transportation Funding



Greening the Fleet consists of several specific funding/cost reduction strategies. To further our efforts to 'green' our transportation portfolio, Region 9 will:

- Maximize of the ongoing replacement of our own and other Federal agencies' inventories with low-emitting vehicles. This has proven to be a successful strategy thus far as Region 9 has converted over 53% of its own fleet to the desirable types. Further, research of the optimum types and business case development to promote them is fundamental to this effort.

- Lower the overall size of the inventory by 9%. (A strategy that crosses over with workplace transformation is the effort to reduce parking.)
- Increase our overall market share by 30%. Become the proponent of a new car sharing program.

5.1.8.3 Supply Chain Funding



The resources to fund our efforts at greening the supply chain will be addressed through transforming what Agencies (including GSA) already purchase in terms of goods and services. Continuous evaluation of the already successful programs and pursue of strategies (found in 5.2 Roadmaps) will ensure progress continues to be made. In short, enhancing existing programs to support green purchasing as well as putting policies and guidelines in place to enforce it is intended as part of the larger Regional Plan.

5.1.8.4 Workplace Transformation Funding



Using results from our two pilot demonstration projects, Region 9 will build out additional demonstration areas in each of the Region's Service Centers. These demonstration installations will catalyze the Enterprise Account Management effort to leverage RWA funding for broader application of workplace transformation and the ultimate reduction of the Portfolio. Additionally, a national effort is underway to develop an alternative funding method aimed at using reductions in rent to finance workplace projects.

5.2 ROADMAPS

Interactive, digital roadmaps have been developed and are being used to give specifics about the current state, future state and outline the roadmap for discrete strategies and actions by the five focus areas. [Available online](#).³²

³² Available at: GSA Region 9, R9 Sustainability Plan. <https://sites.google.com/a/gsa.gov/pacific-rim-sustainability/r9-sustainability-plan>



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> Four new construction projects and four major renovation projects currently underway (see Section 3.2.1.1 for listing of projects and standards and certifications followed) 	<ul style="list-style-type: none"> Centralized skilled and licensed personnel. Project Teams are generally demarcated among division lines. No specific team assignment for energy, water and waste-water goal attainment and tracking. 	<ul style="list-style-type: none"> Employees keep up with new technology informally via vendors and periodicals Inconsistent commissioning/measurement and verification criteria Design and Construction has embraced many innovative strategies (See R9 Current State Section 3.2.1.1). <p style="text-align: right;"> Full R9 Current State Full R9 Building Assessment </p>

FUTURE STATE

DRIVING GOALS	INTEGRATED PROCESS	OVERARCHING
<ul style="list-style-type: none"> National Strategic Plan Goal Summaries R9 Sustainability Dashboard All building projects and utilization focus will be designed to meet energy intensity reduction goals of 37.5% by 2020 (actual goals to be determined building-by-building)." (National Goal 1, Part 1) All buildings projects and programs will have a significant role in the reduction of Greenhouse Gas (GHG) 28.7% by 2020 (baseline FY08)." (National Goal 1) All building projects will result in a reduction of potable water use by 26% by 2020." (National 	<ul style="list-style-type: none"> GSA's path to sustainability begins with embracing an integrated approach to all projects. Once the integrated design approach is institutionalized, sustainable practices will infuse all facets of building management and project development. Emphasis on alignment with workplace transformation is key. (National Goal 3) Sustainability will be acknowledged as a fundamental guideline, rather than as a possible addition, for all building considerations. Whole building design will represent a pivotal shift for the conception and enlistment of value engineering in support of sustainable targets. A deep understanding of each building will be realized and integral to 	<ul style="list-style-type: none"> Project standards will be elevated to meet the rising demand of optimizing sustainable strategies. Streamline process for getting on GSA schedule will result in GSA securing top industry firms at the best value for the taxpayer's dollar. (R9 Goal) GSA contract services will possess a complete understanding of the regional plan goals and strategies and drive sustainability in all contract actions. Projects will utilize power purchase agreements and other financial vehicles for investments in photovoltaic, fuel cell, turbines, and innovative technologies (e.g., seawater chilling systems).(R9 Goal)

<p>Goal 4)</p> <ul style="list-style-type: none"> By FY20, GSA will reduce Scope 3 GHG emissions attributed to contracted wastewater treatment by 5% (baseline FY08). (National Goal 2) By 2020, R9 will increase renewable energy production and procurement to 30% of annual energy consumption.” (National Goal 1, Part 1) New construction project standards will use net zero as a benchmark for all projects.” (National Goal 3) Greater than 18% of GSA’s owned and leased inventory (greater than 5,000 gross square feet) will incorporate sustainable practices found in the <i>Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings</i>. (National Goal 3) 	<p>our decision making process through an established Building Assessment Task Force. (National Goal 3)</p> <ul style="list-style-type: none"> GSA will lead the private sector in new innovation by incorporating sustainable strategies into each project and leverage our ability to drive markets and partner with all levels of stakeholders. (R9 Goal) 	<p>Full R9 Future State</p>
--	---	---



[Full R9 Strategies](#)

<p>(1) Create a Project Standards New Construction/Major Renovation Guideline and Checklist using the Whole Building Design Guide and Integrated</p>	<ul style="list-style-type: none"> Silo’ed Decision-making Dynamic nature of sustainable product market Limitations of FAR from contract 	<p>MT Establish an on-going Project Standards Multidisciplinary Team to create a sustainably-maximized, streamlined project implementation process (planning, design, construction, building occupancy, and operations) through the use of a New Construction/Major Renovation project standards guideline (N/C and M/R)</p>	<p>Initial Project Standards Team meeting Q3 FY2013.</p> <p>Other targets to be set by team as actions are developed.</p>
---	---	---	--

Design Process framework.

perspective

- Difficulty in assigning blanket requirements for dynamic projects
- Conflicting agency goals, agency resistance, and singular vision
- Numerous internal applications with little or no data interchange and repetitive data entry
- Lack of consistent information about the portfolio
- Traditional project focus - time and money (i.e. Performance Measures) verses holistic building approach
- Lack of current educational programs
- Treatment of sustainability in projects as an “add-on” vs. fundamental component
- Project Teams unfamiliar with sustainable requirements

and checklist (one for each phase of implementation)

IDP Use a typical critical path method (CPM) outline and gPM principles to identify players involved and how each CPM item will be addressed.

- Energy and Sustainability Branch to develop complimentary standard list of checkpoints to ensure maximum energy performance.
- Technical division to provide guideline for product warranty expiration vs. time of installation consideration.
- Measurement and Verification engineered reports required for all energy saving projects. Water savings to be reported as part of the basic project reporting.
- Include gPM-related Quality Assurance considerations and performance-based standards.

IDP Carefully consider and outline the consistent inclusion of building (O&M staff and GSA Building Management) and other pertinent contributors (utilities, agencies, customers, etc) into the process, as well as, when they participate throughout the project implementation process.

- Customer interaction – Determine optimum points of customer interaction during planning, design, construction, building occupancy, and operations. Methods can include utilizing building-held tenant meetings.
- On-site Operations and Maintenance - Determine optimum points of Operations and Maintenance staff interaction during planning, design, construction, building occupancy, and operations.
- Building Management – Consistent and dedicated involvement throughout the process (potentially around critical inspections).

IDP The Pre-design/Design phase will include considerations for:

- Establish requirement that every project will have a MDT (all stakeholders represented) to develop and review a project description/definition used to launch the project

implementation process.

- Integrate a charrette into the design phase of every new construction and major renovation project and include direct operations (may be existing O&M contractor) staff, GSA Building Management, and other pertinent stakeholders.
- Use the [Sustainable Facilities Tool](#) for all project development.
- For Major Renovations, all projects to be considered through the Building Assessment Taskforce (see [Retrofits roadmap](#) for MT details) which leverages various reporting and evaluation reports (ABP, MARS, direct surveys, weBBER and PCS reports, etc).
- Require careful consideration of all systems and building conditions throughout the implementation process. Specific points during design to be identified in the project plan for this whole building approach.
- Require LCA (Life Cycle Assessment) for all project strategies and use in final consideration of future project design and general standards on-going development.
- Determine sustainable contractor practices (i.e. covering supply vents during construction) common to most projects and provide to contracting team.
- Re-evaluate the role and impact of the Design Excellence program with subsequent recommendations to be given to national office. Achievement will include looking at the DE selection process itself, as well as, finding a balance between performance and aesthetics with sustainable considerations as the driver.
- Identification of key design tools for the given project and how they help inform the process (i.e. Building Information Modeling, physical environment studies, past project business cases, etc) to be outlined.

F Examine each project to determine alternative financing options, if any

- Develop a standard for utilizing CFR41, Sub Chapter B Part 102-39 Replacement of Personal Property Pursuant to the Exchange/Sale Authority for initial financing of project(s) during the design, as well as, identifying opportunities during construction. (work with Alternative Financing team)

- Investigate ESPCs, PPAs, etc with the support of the Alternative Financing team.

Set up a program to evaluate existing building infrastructure and develop layered as-builts to provide conditions for such items as: lighting, plumbing, HVAC, abandon in place, etc. with standard for consistent, required updating as projects are executed. Institute mandatory as-built drawing delivery upon project completion.

Include related programs (being developed by other teams) in the guideline, like the C&D diversion and carpet recycling programs and ensure they align with reporting and tracking tools.















Develop method for tracking project information to assist with (note eventual tie to information captured in standard reporting tools (i.e. gBuild):

- Enterprise Communications Team publications/promotion
- Business Case developments around specific technologies to enhance understanding and future application, as well as, create customer buy-in.
- Technical division project packet (turnover packets).
- Case Study reporting – to be used for [Sustainable Facilities Tool](#) publication and for R9 future project development to be housed on [Pacifi Rim Sustainability One-Stop-Shop](#). In short, to formalize and utilize post-mortem analysis in all applicable ways.
- Awards and honors applications.

Contractor Evaluation and C-PARS system improvements:

- Evaluation notes will be developed through-out the project life cycle at 3 critical points minimally: prior to bid, during construction (CPM inspections), and after project completion. Design a corresponding comprehensive evaluation form (Prime and Subcontractors) that guides this CPM evaluation.
- All evaluations will be required to be uploaded to the central database contractor system (C-PARS).

		<ul style="list-style-type: none"> ▪ A C-PARS how-to-guide is to be created and uploaded to the Pacific Rim Sustainability One-Stop-Shop. <p>Regularly re-evaluate the guideline and checklist. Ensure that all MT developed documents are posted on the Pacific Rim Sustainability One-Stop-Shop.</p> <p>Full Blue Icon Legend</p>	
<p>(2) Establish Project Standards Multi-disciplinary Team to drive processes, systems, resources, and tools improvements.</p>	<ul style="list-style-type: none"> ▪ Silo'ed Decision-making ▪ Dynamic nature of sustainable product market ▪ Difficulty in assigning blanket requirements for dynamic projects ▪ Numerous internal applications with little or no data interchange and repetitive data entry ▪ Lack of consistent information about the portfolio ▪ Treatment of sustainability in projects as an "add-on" vs. fundamental component 	<p>Develop list of reporting systems requirements and work with national office to optimize the programs and resulting reporting.</p> <p> Participate on contracting multi-disciplinary team to improve solicitation process and all contacts affecting good projects.</p> <p> Participate on Operations and Maintenance multi-disciplinary team to maximize operational excellence and post-project performance.</p> <p> Provide content and recommendations for the R9 Sustainability Plan One-Stop Shop.</p> <p> Develop projects around customer sustainability goals utilizing the Enterprise Account Program.</p> <p>Investigate current databases for project-related information and find maximized approach. (a digital database intended for O&M manual updating and any other project-related documentation.). Research all current systems and their capabilities as a baseline (eSMART, EDMS, etc).</p> <p>Develop a region-level resource group who can provide technical support and a focus to sustainability throughout the project.</p> <p>Full Blue Icon Legend</p>	<p>Initial Project Standards Team meeting Q3 FY2013.</p> <p>Other targets to be set by team as actions are developed.</p>

<p>(3) Improved Education and training for project team members.</p>	<ul style="list-style-type: none"> ▪ Lack of current educational programs ▪ Project Teams unfamiliar with sustainable requirements 	<p> Use Project Standards Team (as found in previous strategies) to outline necessary certifications and training and the link to performance.</p> <p> Research online training, mentor programs, and other creative tools to be considered by Education Team.</p> <p> Develop informational criteria on GSA's changing methodologies and goal expectations with contractors developing and executing contracts.</p> <p> Create a standard for vendor/contractor post-installation training and education around specific technologies used in projects (as they are determined) and incorporate into the associated contracts. O&M Standards and Enhancement of SKills Document</p> <p> Develop customer information sessions to bridge installation and post installation use and how they can best support success of the project.</p> <p>Full Blue Icon Legend</p>	<p>Initial Project Standards Team meeting Q3 FY2013.</p> <p>Other targets to be set by team as actions are developed.</p>
<p>(4) Formalize and develop accessible, general sustainability training/educational opportunities</p>	<ul style="list-style-type: none"> ▪ General skill gap and understanding of sustainability 	<p> Create curriculum-based sustainability training for facilities managers. Look for opportunities to count toward industry certifications.</p> <p> Targeted educational programs and outreach for general technical, standards and policies and customer preferences for audiences across all teams and applicable business lines.</p> <p> Develop customer-focused information sessions regarding GSA goals, R9 Sustainability Plan, and the larger picture of our impacts.</p> <p>Specific training for programs like; Energy Star, Certification tools, LEED, etc.</p>	<p>Education Multi-disciplinary Team (and Project Standards team) to meet and set team goals – Q4 FY13</p>

E As part of the Regional Office and new 50 UNP location, build a shared Resource Library (Design and Construction, Energy and Sustainability, Portfolio, etc) to be available to all GSA R9 personnel which will facilitate the advancement of sustainable projects across the Region.

[Full Blue Icon Legend](#)

(5) Recommend practices and procedures to incentivize and drive sustainable behavior by our tenant agencies in owned and leased space. (Incentivizing Customers flow chart

- OMB policy and procedures pertaining to agency rent budgets, GSA Pricing Policy on how rent is charged, and the ability to quantify energy savings in multi-tenanted buildings
- Lack of continuity between various agency sustainability goals.

MT Develop a PBS multi-discipline team consisting of members from READ, Service Centers (Property Management), Portfolio Management and Client Solutions to determine specific actions.

- Examine rent policy
- Examine overtime utilities and develop ways to engage users in energy-saving strategies
- Build business cases for retrofit project strategies which lend themselves to RWA funding, to work with enterprise account management program
- Request engagement at National level
- Develop specific ROI tenant policy and roll out universally

[Full Blue Icon Legend](#)

Q4 FY 2013



(6) Establish alternative financing program for all manner of projects and programs. (Alternative Financing).



- Some alternative financing vehicles are not vetted for public sector use.
- Lack of well documented experience.

MT F Work with alternative finance and contracting teams to leverage best approaches and strategies to contract development and execution (ie or eg. maintenance of equipment related to performance vs energy saved)



F Create policy related to alternatively- financed projects and refine as lessons are learned.

IDP PA Vet projects using all appropriate factors : aggregating across sites and agency considerations, coordinating O&M requirements, reviewing the relationship of proposed project work to

		<p>other project work, reviewing leasing or asset management plans for each building, and coordinating with national and regional programs.</p> <p> Discern and distill specific accounting considerations and provide guidelines</p> <p> Develop a standard for utilizing CFR41, Sub Chapter B Part 102-39 Replacement of Personal Property Pursuant to the Exchange/Sale Authority for potential initial financing of other, sustainably-focused project(s)</p> <p>Full Blue Icon Legend</p>	
--	--	--	--

<p>(7) Improved Operations and Maintenance to support sustainable strategies (customers, region, field office and contractors). (O&M Standards and Advancement of Skills)</p>	<ul style="list-style-type: none"> ▪ Customer demands overriding sustainable initiatives ▪ Mis-use of subcontracted support which inhibits understanding and implementation of sustainable practices. ▪ Older buildings are in need of increased funding to replace or refurbish existing equipment. ▪ Fear of adopting new technology. ▪ Resources (funding and personnel) 	<p>  Assemble an Operations and Maintenance Multi-Disciplinary Team focused on developing methods and actions to:</p> <ul style="list-style-type: none"> ▪ Address the way we do business and reset the way we look at our surrounding environment, expected standards of performance, and increase collaboration from a sustainable perspective to succeed. ▪ Address the lack of clear roles and responsibilities for the implementation of sustainability. ▪ Identify what resources can be leveraged internally and what additional resources are needed. For example, identify necessary skills to operate equipment for current and future building inventory and work with the Educational group to develop appropriate programs. ▪ Develop contract clauses and stipulations that allow for the proper management of O&M staffs, as well as a management system for the O&M subcontractors, with regard to sustainable projects and post-maintenance. ▪ Provide an overview of what the impacts of the approaches developed can have, a method of tracking progress against those approaches, and details regarding how we can best capitalize on our assets. ▪ Provide a time line for implementation. (this should be in concert with the rest of the plan strategies) 	<p>Q4 FY 2013</p>
--	--	--	--------------------------

		<p>Develop a minimum standard for sustainable operations at each building and work with the Field Offices and Contracting Officers to establish an effective Quality Assurance plan.</p> <p>Full Blue Icon Legend</p>	
<p>(8) Reevaluate technical review and input into projects</p>	<ul style="list-style-type: none"> Existing perception that technical reviews delay the construction process. Significant part of existing building inventory needing seismic upgrades and hazardous material abatement. Physical layout of some buildings in the inventory not conducive to meeting agency driven security approaches. 	<p>Utilize EPA's I-BEAM (Indoor Air Quality Building (IAQ) Education and Assessment Model) to enhance the IAQ review process "</p> <p>(www.epa.gov/iaq/largebldgs/i-beam/index.html)</p> <p>Re-examine processes and reviews to more robustly interpret and comply with building standards and codes. These would include; environmental, structural, and accessibility reviews.</p> <p>Educate project teams on project benefits to more robust reviews. Potential impacts to include:</p> <ul style="list-style-type: none"> Decrease in project execution time line Increase in tenant satisfaction and ease of overall project delivery Increase in overall compliance and quality of construction Increase in ease of long-term operations and efficiency <p>Full Blue Icon Legend</p>	<p>Q4 FY 2013</p>
<p>(9) Create Sustainability Reviews for all projects</p>	<ul style="list-style-type: none"> Little technical/sustainability experts currently on staff. Additional review leading to potential increase in review time. 	<p>Create one point of sustainability review and sign off for all projects at 75% design phase (Energy and Sustainability Branch)</p> <ul style="list-style-type: none"> Determine specific review criteria and continue to develop based on projects complete and sustainable community input. <p>Required review of Sustainability Checklist (see above Strategy) and supporting documentation throughout project construction (performed by Energy and Sustainability Branch). All measurement and verification</p>	<p>Q4 FY 2013</p>

		<p>reporting to be reviewed at initial baseline data collection as well as the final verification report.</p> <p>Educate project teams on project benefits to more robust reviews. Potential impacts to include:</p> <ul style="list-style-type: none"> ▪ Decrease in project execution time line ▪ Increase in tenant satisfaction and ease of overall project delivery ▪ Increase in overall compliance and quality of construction ▪ Increase in ease of long-term operations and efficiency <p>Full Blue Icon Legend</p>	
<p>(10) Increase sustainability considerations within compliance criteria and minimum standards</p>	<ul style="list-style-type: none"> ▪ Resistance to new concepts 	<p>Influence and implement improved P100 by participating in Central Office related panels and boards and driving for continued enhancement of sustainability-focused language</p> <p> Continue to drive to higher levels of certifications (e.g., LEED, EnergyStar) using National Strategic Plan Goals and understanding of available standards in the market</p> <p>Full Blue Icon Legend</p>	<p>Initial Project Standards Team with Energy Branch and Design and Construction - meeting Q4 FY2013.</p>
<p>(11) Improve contractor engagement post-contract award.</p>	<ul style="list-style-type: none"> ▪ Beyond the FAR, there is no documented process for engaging contractors. 	<p>As part of project contracts, retain 5% of the total project value to be held until project savings are demonstrated via measurement and verification activities.</p> <p> Work with FPS to streamline security clearance system</p> <p>Investigate other innovative ways to engage contractors to garner more sustainable results in projects.</p> <p>Full Blue Icon Legend</p>	<p>Q2 FY 2014</p>

<p>(12) Incorporate renewable energy into new construction, and major renovation</p>	<ul style="list-style-type: none"> ▪ Potential payback exceeds current accepted timeframes for return on investment 	<p>F Consider use of alternative financing tools to implement renewable energy aspects in new construction/major renovation projects projects. Should also be addressed in the sustainability review as discussed in previous strategy.</p> <p>A Develop renewable energy program which directly ties projects to 30% goal</p> <p>all applicable projects for renewable energy opportunities.</p> <p>Full Blue Icon Legend</p>	<p>Q4 FY 2014</p>
---	--	--	--------------------------

<p>(13) Drive sustainability in procurement to become a priority in all purchasing decisions.</p>	<ul style="list-style-type: none"> ▪ Lack of financial, time, and man-power resources. ▪ Lack of consistent platform and delivery of sustainability requirements and goals for contracting vehicles. ▪ Lack of training/understanding in how to assess and verify sustainable requirements in all contracts. ▪ Procurement is executed across the organization making operational control more challenging. ▪ Resistance to change from employees and contractors. ▪ Lack of continuity with project leadership and resulting missed opportunities to work collaboratively on sustainable objectives. 	<p>MT Create joint Project Standards/Acquisition Management Multidisciplinary Team to examine:</p> <ul style="list-style-type: none"> ▪ Clearly define sustainable procurement. (For this use Small Business goals and tracking methods as an example of how to classify multi-level, dynamic requirements.) ▪ Once definition in place, determine educational program for acquisition workforce, create how-to communication guide for internal and external stakeholders, and determine method for reporting and tracking that standards are met. ▪ Establish PBS-related Regional BPAs and IDIQs, which foster the selection of vendors that include experience and past performance, as well as, how to achieve our sustainable goals and greening initiatives. ▪ Develop SOW guidelines for contractors to provide sustainability plans, when appropriate. ▪ Develop a platform to identify best practices and share regional success stories (may request Enterprise Communication Team participation). ▪ Provide economic incentives to contractors to implement sustainable practices, when appropriate. <p>Promote continued use of FSSI BPAs for all office supplies, furniture, etc.</p> <p>Facilities Management & Services Programs Division to</p>	<p>Q4 FY 2013</p> <p>In process and on-going</p>
--	---	---	--

	<ul style="list-style-type: none"> ▪ Meaning of 'sustainability' is not clearly understood by all. ▪ Cultural myths and assumptions about cost of sustainable products and services. 	<p>work with our major supply/service bases (within NISH, now Ability One) to help drive sustainability into their practices/products/services. Possibility leverage existing regional partnership agreement to incorporate sustainable elements into the joint performance goals.</p> <p>Develop contract sustainable-related clause review process to ensure applicable clauses are included. Where applicable (mainly for projects) submit all contracts for sustainability technical review (as outlined in previous strategy).</p> <p>Full Blue Icon Legend</p>	<p>Q1 FY 2014</p> <p>Contract Review – determine by Q4 FY13.</p> <p>Technical Review – when review process is outlined by Project Standards team.</p>
--	--	--	---

[Back to Top](#)



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> ARRA limited scope projects: 80 contracts (approximately \$65 million). Strategies include: advanced lighting, plumbing fixture replacement, mechanical upgrades, BAS replacement, renewable energy. Field Office BA54 projects funded on as-needed basis. Service Centers drive and track energy and water projects. Active retro-commissioning program (FMSPD). Participation in Central Office annual review of project ROI, estimated energy savings and GHG reductions. All Region 9 buildings over 5,000 square feet have advanced electric meters installed. 	<ul style="list-style-type: none"> Regular customer meetings are held at each building and projects are presented. Majority of energy and water projects are executed out of Regional Office. Decision was made to move project management to Service Center/Field Office locations. Project development and guidelines/standards to be left as a Region responsibility. 	<ul style="list-style-type: none"> Collaboration with utilities by Field Offices and Energy and Sustainability Branch for new technologies and pilot installations. On-going partnership with agencies to install vehicle charging stations (56 stations installed). <p style="text-align: right;"> Full R9 Current State Full R9 Building Assessment </p>

FUTURE STATE

DRIVING GOALS	INTEGRATED PROCESS	BUILDING-BY-BUILDING	OVERARCHING
<ul style="list-style-type: none"> National Strategic Plan Goal Summaries R9 Sustainability Dashboard All building projects and utilization focus will be designed to meet energy intensity reduction goals of 37.5% by 2020 	<ul style="list-style-type: none"> GSA's path to sustainability begins with embracing an integrated approach to all projects. Once the integrated design approach is institutionalized, sustainable practices will infuse all facets of building management and project development. Emphasis on alignment with workplace 	<ul style="list-style-type: none"> Building level management will be empowered to make sustainable choices using real-time data and dashboards produced by advanced building automation systems (BAS) coupled with monitoring and diagnostic systems. (R9 Goal) Pending Climate Adaptation Plan 	<ul style="list-style-type: none"> Project standards will be elevated to meet the rising demand of optimizing sustainable strategies. Streamline process for getting on GSA schedule will result in GSA securing top industry firms at the best value for the taxpayer's dollar. (R9 Goal) Region 9 will continue to pursue

(actual goals to be determined building-by-building).

([National Goal 1, Part 1](#))

- All buildings projects and programs will have a significant role in the reduction of Greenhouse Gas (GHG) 28.7% by 2020 (baseline FY08). ([National Goal 1, Part 1](#))
- All building projects will result in a reduction of potable water use by 26% by 2020. ([National Goal 4](#))
- By FY20, GSA will reduce Scope 3 GHG emissions attributed to contracted wastewater treatment by 5% (baseline FY08). ([National Goal 2](#))
- By 2020, R9 will increase renewable energy production and procurement to 30% of annual energy consumption. ([National Goal 1, Part 1](#))
- By FY16, all buildings over 5,000 square feet will have advanced meters for gas, steam, electricity, and water installed. ([National Goal 1, Part 1](#))
- Greater than 18% of GSA's owned and leased inventory (greater than 5,000 gross square feet) will incorporate sustainable practices found in the *Guiding Principles for Federal Leadership*

transformation is key.

([National Goal 3](#))

- Sustainability will be acknowledged as a fundamental guideline, rather than as a possible addition, for all building considerations. Whole building design will represent a pivotal shift for the conception and enlistment of value engineering in support of sustainable targets. A deep understanding of each building will be realized and integral to our decision making process through an established Building Assessment Task Force. ([National Goal 3](#))
- GSA will lead the private sector in new innovation by incorporating sustainable strategies into each project and leverage our ability to drive markets and partner with all levels of stakeholders. ([R9 Goal](#))
- rGPG (regional green proving ground) Program fits into the GSA Green Proving Ground portfolio as an extension and complementary partner in accelerating the adoption of emerging green building technologies.

and industry projections, GSA will leverage energy conservation and production strategies as well as water conservation and retention to best position for potential increase in costs and resource availability. Maximum levels of energy and water self-sufficiency will be achieved through the use of a building-by-building plan which includes locality analysis.

all Green Proving Ground projects, pilot programs, and sustainable initiatives feasible. Four smart building pilot projects will be completed and expansion contingent on the analysis of their performance. ([R9 Goal](#))

- Projects will utilize power purchase agreements and other financial vehicles for investments in photovoltaic, fuel cell, turbines, and innovative technologies (e.g., seawater chilling systems). ([R9 Goal](#))

in High Performance and Sustainable Buildings.
([National Goal 3](#))

[Full R9 Future State](#)



[Full R9 Strategies](#)

(1) Using a multi-disciplinary team and the integrated design process, institute dynamic building-by-building analysis, whole building assessment, and project roll-out strategy for the entire portfolio

- Relative time of project strategy development and implementation in relation to meeting goals
- Silo'ed decision making
- Limited financial analysis of project benefits to date (simple payback) to understand entire sustainability benefit
- Unique dynamics within each building and cumulative effects of past projects

- MT IDP PA** Establish [Building Assessment Taskforce](#)
- Develop [Executive Report](#) with full analysis (parametric estimates) and recommendations for baseline energy and water saving projects using the top 15 energy usage buildings (delivered as part of this plan).
 - Create baseline assessment of entire portfolio of owned, goal-tracked buildings ([Appendix F: Current State of the Portfolio](#))
- MT IDP PA** Taskforce to become [Sustainable Buildings Team](#) The team will use the baseline assessment mentioned above as a foundation for reviewing buildings on a regular cycle (every 2 years at a minimum and 3 to 6 at every monthly meeting) using:
- List of all building requested/generated projects (excluding minor TIs)
 - New and/or improved energy studies, retro-commissioning reports, MARS reviews, weBBER reports, Physical Condition Survey (PCS) assessments, Asset Business Plans (ABP), latest Report of Excess, energy and water usage reports, building surveys (as needed), and the updated [Current State of the Portfolio](#) document.
 - Take full advantage of National programs (Green Proving Ground) to be a leading agent and continue to optimize possible savings. Track progress of proposed rGPG

First meeting **December 1, 2012**

Ongoing
(Next Meeting July 2013)

(regional Green Proving Ground) effort.

- Develop on-going analysis of completed project results to determine best fit projects

[Full Blue Icon Legend](#)

(2) Create a Project Standards Retrofits/Small Projects Guideline and Checklist using the Whole Building Design Guide and Integrated Design Process framework

- Silo'ed Decision-making
- Dynamic nature of sustainable product market
- Limitations of FAR from contract perspective
- Difficulty in assigning blanket requirements for dynamic projects
- Conflicting agency goals, agency resistance, and singular vision
- Numerous internal applications with little or no data interchange and repetitive data entry
- Lack of consistent information about the portfolio
- Traditional project focus - time and money (i.e. Performance Measures) verses holistic building approach
- Lack of current educational programs
- Treatment of sustainability in projects as an "add-on" vs. fundamental component
- Project Teams unfamiliar with

MT Establish an on-going Project Standards Multidisciplinary Team to create a sustainably-maximized, streamlined project implementation process (planning, design, construction, building occupancy, and operations) through the use of a Retrofit/Small Projects Standards Guideline and Checklist (one for each phase of implementation).

IDP Use a typical critical path method (CPM) outline and gPM principles to identify players involved and determine how each CPM item will be addressed.

- Energy and Sustainability Branch to develop standard list of checkpoints (complimentary to the larger guideline) to ensure maximum sustainable performance.
- Technical division to provide guideline for product warranty expiration vs time of installation consideration.
- Measurement and Verification engineered reports required for all energy saving projects. Water savings to be tracked (utility usage at a minimum) and reported as part of the basic project reporting by the project team.
- Include gPM-related Quality Assurance considerations and performance-based standards in all documents and processes.

IDP Consider carefully and outline the consistent inclusion of building (O&M staff and GSA Building Management) and other pertinent contributors (utilities, agencies, customers, etc) into the entire process, as well as, when they participate throughout implementation.

- Customer interaction – Determine optimum points of customer interaction during planning, design, construction, building occupancy, and operations. Methods can include

Initial Project Standards Team meeting **Q3 FY 2013.**

Other targets to be set by team as actions are developed.

sustainable requirements

utilizing building-held tenant meetings.

- On-site Operations and Maintenance - Determine optimum points of O&M staff interaction during planning, design, construction, building occupancy, and operations.
- Building Management – Consistent and dedicated involvement throughout the process. (potentially around critical inspections).



"The Pre-design/Design phase will include considerations for:

- All projects to be considered through the Building Assessment Taskforce (see Strategy #1 for details) which leverages various reporting and evaluation methods (ABP, MARS, direct surveys, weBBER and PCS reports, etc). Include direct operations (may be existing O&M contractor) staff, GSA Building Management, and other pertinent stakeholders in the final project scope of work when appropriate.
- Post-Building Assessment and Senior Leadership project approval, all applicable projects will be assessed for alignment and determination of possible benefits with the Workplace Transformation strategies.
- Require LCA (Life Cycle Assessment) for all project strategies under consideration and use as the final consideration for project design, as well as, general standards on-going development.
- Determine sustainable contractor practices (i.e. covering supply vents during construction) common to most projects and provide to contracting team.
- Use the Sustainable Facilities Tool for all applicable project development.
- Require careful consideration of all systems and building conditions throughout the implementation process. Specific points during design to be identified in the project plan for this whole building approach. (i.e. new windows installed, then assess HVAC).
- All energy and water projects to provide "How-To" for future TI and Retrofit projects adding on to the new system. This should be included in the contract requirements.



Examine each project to determine alternative financing options, if any.

- Develop a standard for utilizing CFR41, Sub Chapter B Part 102-39 Replacement of Personal Property Pursuant to the Exchange/Sale Authority for initial financing of project(s) during the design, as well as, identifying opportunities during construction. (work with Alternative Financing Team).
- Investigate ESPCs, PPAs, etc with the support of the Alternative Financing Team and as part of the Sustainable Buildings Team (currently the Building Assessment Task Force).

Set up a program to evaluate existing building infrastructure and develop layered as-builts to provide conditions for such items as: lighting, plumbing, HVAC, abandon in place, etc. with standard for consistent, required updating as projects are executed. Institute mandatory as-built drawing delivery upon project completion.



Include related programs (being developed by other teams) in the guideline, like the C&D diversion and carpet recycling programs and ensure they align with reporting and tracking tools.







Develop method for tracking project information to assist with (note eventual tie to information captured in standard reporting tools i.e. gBuild):

- Enterprise Communications Team publications/promotion
- Business Case developments around specific technologies to enhance understanding and future application of projects, as well as, create customer buy-in.
- Technical division project packet (turnover packets).
- Case study reporting – to be used for Sustainable Facilities Tool publication and for R9 future project development. To be housed on One-Stop-Shop. In short, to formalize and utilize post-mortem analysis in all applicable ways.
- Awards and honors applications.









Contractor Evaluation and C-PARS system improvements:

- Evaluation notes will be developed through-out the project






		<p>life cycle at three (3) critical points minimally: prior to bid, during construction (CPM inspections), and after project completion. Design a corresponding comprehensive evaluation form (Prime and Subcontractors) that guides this CPM evaluation.</p> <ul style="list-style-type: none"> ▪ All evaluations will be required to be uploaded to the central database contractor system (C-PARS). ▪ A C-PARS how-to-guide is to be created and uploaded to the One-Stop-Shop. <p>Regularly re-evaluate the guideline and checklist. Ensure that all MT developed documents are posted on the One-Stop-Shop.</p> <p>Full Blue Icon Legend</p>	
--	--	---	--

<p>(3) Establish Project Standards Multi-disciplinary Team to drive processes, systems, resources, and tools improvements.</p>	<ul style="list-style-type: none"> ▪ Silo'ed decision-making ▪ Dynamic nature of sustainable product market ▪ Difficulty in assigning blanket requirements for dynamic projects ▪ Numerous internal applications with little or no data interchange and repetitive data entry ▪ Lack of consistent information about the portfolio ▪ Treatment of sustainability in projects as an "add-on" vs. fundamental component 	<p>Develop list of reporting systems requirements (i.e. gBuild, ePM, etc.) and work with national office to optimize the programs and resulting reporting.</p> <p>Investigate current databases for project-related information and find maximized approach (a digital database intended for O&M manual updating and any other project-related documentation). Research all current systems and their capabilities as a baseline (eSMART, EDMS, etc.).</p> <p> Participate on contracting multi-disciplinary team to improve solicitation process and all contracts affecting projects.</p> <p> Participate on Operations and Maintenance multi-disciplinary team to maximize operational excellence and post-project performance.</p> <p> Provide content and recommendations for the R9 Sustainability Plan One-Stop Shop.</p> <p> Develop projects around customer sustainability goals utilizing the Enterprise Account Program.</p>	<p>Initial Project Standards Team meeting Q3 FY 2013.</p> <p>Other targets to be set by team as actions are developed.</p>
---	---	--	---

		<p>Develop a region-level resource group who can provide technical support and a focus to sustainability throughout the project.</p> <p>Building Assessment Taskforce to provide concentrated examination and recommendations for Diagnostics tools by building.</p> <p>Full Blue Icon Legend</p>	
--	--	---	--









<p>(4) Improved Education and training for project team members.</p>	<ul style="list-style-type: none"> ▪ Lack of current educational programs ▪ Project Teams unfamiliar with sustainable requirements 	<p> Use Project Standards Team (as found in previous strategies) to outline necessary certifications and training and the link to performance.</p> <p>  Research online training, mentor programs, and other creative tools to be considered by Education Team.</p> <p> Develop informational criteria on GSA's changing methodologies and goal expectations with contractors developing and executing contracts.</p> <p> Create a standard for vendor/contractor post-installation training and education around specific technologies used in projects (as they are determined) and incorporate into the associated contracts. O&M Standards and Enhancement of Skills</p> <p>  Develop customer information sessions to bridge installation and post installation use and how they can best support success of the project.</p> <p> For specific project strategies, use local project prototypes to engage and demonstrate sustainable attributes to customers.</p> <p>Full Blue Icon Legend</p>	<p>Initial Project Standards Team/Education Team meeting Q4 FY 2013.</p> <p>Other targets to be set by team as actions are developed.</p>
---	--	--	--

(5) Formalize and			
--------------------------	--	--	--

<p>develop accessible, general sustainability training/educational opportunities</p>	<ul style="list-style-type: none"> General skill gap and understanding of sustainability 	<ul style="list-style-type: none">  Create curriculum-based sustainability training for facilities managers. Look for opportunities to count toward industry certifications.  Targeted educational programs and outreach for general technical, standards and policies and customer preferences for audiences across all teams and applicable business lines.  Develop customer-focused information sessions regarding GSA goals, R9 Sustainability Plan, and the larger picture of our impacts. <p>Specific training for programs like; Energy Star, Certification tools, LEED, etc.</p> <ul style="list-style-type: none">  As part of the Regional Office and new 50 UNP location, build a shared Resource Library (Design and Construction, Energy and Sustainability, Portfolio, etc) to be available to all GSA R9 personnel which will facilitate the advancement of sustainable projects across the Region. <p>Full Blue Icon Legend</p>	<p>Education Multi-disciplinary Team</p> <p>Q4 FY 2013</p> <p>Other targets to be set by team as actions are developed</p>
<p>(6) Recommend practices and procedures to incentivize and drive sustainable behavior by our tenant agencies in owned and leased space.” (Incentivizing Customers Flowchart)</p>	<ul style="list-style-type: none"> OMB policy and procedures pertaining to agency rent budgets, GSA Pricing Policy on how rent is charged, and the ability to quantify energy savings in multi-tenanted buildings Lack of continuity between various agency sustainability goals. 	<ul style="list-style-type: none">  Develop a PBS multi-disciplinary team consisting of members from READ, Service Centers (Property Management), Portfolio Management and Client Solutions to determine specific actions. <ul style="list-style-type: none"> Examine rent policy Examine overtime utilities and develop ways to engage users in energy-saving strategies Build business cases for retrofit project strategies which lend themselves to RWA funding, to work with enterprise account management program Request engagement at National level Develop specific ROI tenant policy and roll out universally 	<p>Q4 FY 2013</p>

(7) Establish alternative financing program for all manner of projects and programs. (Alternative Financing).



- Some alternative financing vehicles are not vetted for public sector use.
- Lack of well documented experience.

-  Build business case for current multi-agency PPA pilot.
-   Work with Alternative Finance and Contracting Teams to leverage best approaches and strategies to contract development and execution (maintenance of equipment related to performance vs. energy saved).
-  Create policy related to alternatively- financed projects and refine as lessons are learned.
-   Vet projects using all appropriate factors : aggregating across sites and agency considerations, coordinating O&M requirements, reviewing the relationship of proposed project work to other project work, reviewing leasing or asset management plans for each building, and coordinating with national and regional programs.
-  Discern and distill specific accounting considerations and provide guidelines.
-  Develop a standard for utilizing CFR 41, Sub Chapter B Part 102-39 *Replacement of Personal Property Pursuant to the Exchange/Sale Authority* for potential initial financing of other, sustainably-focused project(s).

[Full Blue Icon Legend](#)

(8) Improved Operations and Maintenance to support sustainable strategies (customers, region, field office and contractors). "

- Customer demands overriding sustainable initiatives
- Mis-use of subcontracted support which inhibits understanding and implementation of sustainable

-   Assemble an Operations and Maintenance Multi-Disciplinary Team focused on developing methods and actions to:
 - Address the way we do business and reset the way we look at our surrounding environment, expected standards of

Q4 FY 2013

(O&M Standards and Advancement of Skills)

practices.

- Older buildings are in need of increased funding to replace or refurbish existing equipment.
- Fear of adopting new technology. Resources (funding and personnel)

performance, and increase collaboration from a sustainable perspective to succeed.

- Address the lack of clear roles and responsibilities for the implementation of sustainability.
- Identify what resources can be leveraged internally and what additional resources are needed. For example, identify necessary skills to operate equipment for current and future building inventory and work with the Educational group to develop appropriate programs.
- Develop contract clauses and stipulations that allow for the proper management of O&M staffs, as well as a management system for the O&M subcontractors, with regard to sustainable projects and post-maintenance.
- Provide an overview of what the impacts of the approaches developed can have, a method of tracking progress against those approaches, and details regarding how we can best capitalize on our assets.
- Provide a time line for implementation. (this should be in concert with the rest of the plan strategies).

Develop a minimum standard for sustainable operations at each building and work with the Field Offices and Contracting Officers to establish an effective Quality Assurance plan.

[Full Blue Icon Legend](#)

(9) Reevaluate technical review and input into projects

- Existing perception that technical reviews delay the construction process

Utilize EPA's I-BEAM (Indoor Air Quality Building (IAQ) Education and Assessment Model) to enhance the IAQ review process "
(www.epa.gov/iaq/largebldgs/i-beam/index.html)

Re-examine processes and reviews to more robustly interpret and comply with building standards and codes. These would include; environmental, structural, and accessibility reviews.

Educate project teams on project benefits to more robust reviews. Potential impacts to include:




- Decrease in project execution time line


Q2 FY 2014

		<ul style="list-style-type: none"> ▪ Increase in tenant satisfaction and ease of overall project delivery ▪ Increase in overall compliance and quality of construction ▪ Increase in ease of long-term operations and efficiency <p>Full Blue Icon Legend</p>	
<p>(10) Create Sustainability Reviews for all projects.</p>	<ul style="list-style-type: none"> ▪ Few technical/sustainability experts currently on staff ▪ Additional review may lead to potential increase in review time 	<p>Create one point of sustainability review and sign off for all projects at 75% and 100% design phases (Energy and Sustainability Branch).</p> <ul style="list-style-type: none"> ▪ Determine specific review criteria and continue to develop based on a project's completions and sustainable community input. <p>Required review by Energy and Sustainability Branch of Sustainability Checklist (see above Strategy) and supporting documentation throughout project construction. All measurement and verification reporting to be reviewed at initial baseline data collection as well as when the final verification report is produced (also E&S Branch).</p> <p>Educate project teams on project benefits to more robust reviews. Potential impacts to include:</p> <ul style="list-style-type: none"> ▪ Decrease in project execution time line ▪ Increase in tenant satisfaction and ease of overall project delivery ▪ Increase in overall compliance and quality of construction ▪ Increase in ease of long-term operations and efficiency <p>Full Blue Icon Legend</p>	<p>Q4 FY 2013</p>
<p>(11) Increase sustainability considerations within compliance criteria and minimum standards.</p>	<ul style="list-style-type: none"> ▪ Lack of consistent platform and delivery of sustainability requirements and goals for 	<p>Influence and implement improved P100 by participating in Central office related panels and boards and driving for continued enhancement of sustainability-focused language.</p>	<p>Initial Project Standards Team with Energy Branch and Design and Construction - meeting</p> <p>Q4 FY 2013</p>

	contracting vehicles.	Continue to drive for higher levels of certifications (e.g. LEED, Energy Star) using National Strategic Plan Goals and understanding of available standards in the market.	
		Full Blue Icon Legend	

(12) Drive sustainability in procurement to become a priority in all purchasing decisions.	<ul style="list-style-type: none"> ▪ Lack of financial, time, and man-power resources. ▪ Lack of consistent platform and delivery of sustainability requirements and goals for contracting vehicles. ▪ Lack of training/understanding in how to assess and verify sustainable requirements in all contracts. ▪ Procurement is executed across the organization making operational control more challenging. ▪ Resistance to change from employees and contractors. ▪ Lack of continuity with project leadership and resulting missed opportunities to work collaboratively on sustainable objectives. ▪ Meaning of 'sustainability' is not clearly understood by all. ▪ Cultural myths and assumptions about cost of sustainable products 	<div> <div>MT</div> <div> <p>Create joint Project Standards/Acquisition Management Multi-disciplinary Team to examine:</p> <ul style="list-style-type: none"> ▪ Clearly define sustainable procurement. (For this use Small Business goals and tracking methods as an example of how to classify multi-level, dynamic requirements.) ▪ Once definition in place, determine educational program for acquisition workforce, create how-to communication guide for internal and external stakeholders, and determine method for reporting and tracking that standards are met. ▪ Establish PBS-related Regional BPAs and IDIQs, which foster the selection of vendors that include experience and past performance, as well as, how to achieve our sustainable goals and greening initiatives. ▪ Improve existing IDIQ pool of A/E, CM, Construction Services, and enlist performance-based criteria in contracts to ensure sustainable savings. ▪ Develop SOW guidelines for contractors to provide sustainability plans, when appropriate. ▪ Develop a platform to identify best practices and share regional success stories (may request Enterprise Communication Team participation). ▪ Provide economic incentives to contractors to implement sustainable practices, when appropriate. </div> </div> <p>Promote continued use of FSSI BPAs for all office supplies, furniture, etc.</p> <p>Facilities Management & Services Programs Division to work with our major supply/service bases (within NISH, now Ability One) to help drive sustainability into their practices/products/services. Possibility leverage existing</p>	Q4 FY 2013
			In process and on-going
			Q1 FY 2014

	and services.	<p>regional partnership agreement to incorporate sustainable elements into the joint performance goals.</p> <p>Develop contract sustainable-related clause review process to ensure applicable clauses are included. Where applicable (mainly for projects) submit all contracts for sustainability technical review (as outlined in previous strategy).</p> <p>Full Blue Icon Legend</p>	<p>Contract Review – determine by Q4 FY 2013.</p> <p>Technical Review – when review process is outlined by Project Standards team</p>
(13) Align with National Climate Adaptation Plan (National Climate Adaptation Plan)		<p>Continue to collaborate with Region 11 regarding the Climate Adaptation Plan development and provide support when necessary.</p> <p>Full Blue Icon Legend</p>	
(14) Institute plug load/power strip program. (Plug Load Initiative)	<ul style="list-style-type: none"> ▪ Funding 	<p>  Leverage the National Renewable Energy Laboratory (NREL) study to develop the pilot(NREL's <i>Plug-Load Control and Behavioral Change in GSA Office Buildings</i> is attached to the bottom of this web page)</p> <p>Full Blue Icon Legend</p>	Q1 FY 2014
(15) Support accountability and tracking efforts, in particular, the dashboard.	<ul style="list-style-type: none"> ▪ Limitation of IT Governance 	<p>Bring advanced electric meters online and use the real-time data for ongoing building performance assessment</p> <p>Understand and leverage current reporting and tracking systems (e.g., gBuild and ePM)</p> <p> Work with Central Office to align planned strategies with functionality of systems.</p> <p> Enhance building level examination of real time building operations and performance. Using data from the existing automation systems, install dashboard programs which provide real time snapshot views.</p>	

		Full Blue Icon Legend	
(16) Create Renewable Energy Program in collaboration with Building Assessment Task Force	<ul style="list-style-type: none"> ▪ Skill Gap 	 Research new technology and stay abreast of the market Continue relationship with NREL Provide technical advisement to alternative funding multi-disciplinary team Support building of enterprise account plan for potential PPA addition to FAS schedule Full Blue Icon Legend	Pending Resources for Energy and Sustainability Branch
(17) Develop regional Green Proving Ground (rGPG) under the guidance of national GPG.	<ul style="list-style-type: none"> ▪ Funding ▪ Resource Allocation 	Leadership to develop program with national GPG to better orchestrate projects and overall programmatic objectives. (R9 Regional Green Proving Ground Concept). Full Blue Icon Legend	Pending Resources for Energy and Sustainability Branch

[Back to Top](#)



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> ▪ Driven from agency requests at the Field level ▪ Projects are typically \$150,000 and under and are executed via standard schedules and 8A contracts ▪ Projects are generally funded by customer agency RWAs 	<ul style="list-style-type: none"> ▪ Administered and managed at the Service Center/Field Office level 	<ul style="list-style-type: none"> ▪ Two tenant improvement projects have achieved LEED CI certification ▪ Used building materials are recycled or reused when appropriate <p style="text-align: right;"> Full R9 Current State Full R9 Building Assessment </p>

FUTURE STATE

DRIVING GOALS	INTEGRATED PROCESS	BUILDING-BY-BUILDING	OVERARCHING
<ul style="list-style-type: none"> ▪ National Strategic Plan Goal Summaries ▪ R9 Sustainability Dashboard ▪ All building projects and utilization focus will be designed to meet energy intensity reduction goals of 37.5% by 2020 (actual goals to be determined building-by-building). (National Goal 1, Part 1) ▪ All buildings projects and programs will have a significant role in the reduction of Greenhouse Gas (GHG) 28.7% by 2020 (baseline FY08). (National Goal 1, Part 1) 	<ul style="list-style-type: none"> ▪ GSA's path to sustainability begins with embracing an integrated approach to all projects. Once the integrated design approach is institutionalized, sustainable practices will infuse all facets of building management and project development. Emphasis on alignment with workplace transformation is key. (National Goal 3) ▪ Sustainability will be acknowledged as a fundamental guideline, rather than as a possible addition, for all building considerations. Whole building design will represent a pivotal shift for the conception and 	<ul style="list-style-type: none"> ▪ Increase density in Federal Buildings and dispose of excess or underutilized buildings: consolidate space, improve space utilization, increase telework participation, workplace design solutions, and disposal of excess or underutilized buildings. (National Goal 1) 	<ul style="list-style-type: none"> ▪ Project standards will be elevated to meet the rising demand of optimizing sustainable strategies. Streamline process for getting on GSA schedule will result in GSA securing top industry firms at the best value for the taxpayer's dollar. (R9 Goal) ▪ GSA contract services will possess a complete understanding of the regional plan goals and strategies and drive sustainability in all contract actions. Projects will utilize power purchase agreements and other financial vehicles for investments in photovoltaic, fuel cell, turbines, and innovative technologies (e.g., seawater

<ul style="list-style-type: none"> All building projects will result in a reduction of potable water use by 26% by 2020. (National Goal 4) By 2020, R9 will increase renewable energy production and procurement to 30% of annual energy consumption. (National Goal 1, Part 1) Greater than 18% of GSA's owned and leased inventory (greater than 5,000 gross square feet) will incorporate sustainable practices found in the <i>Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings</i>. (National Goal 3) 	<ul style="list-style-type: none"> enlistment of value engineering in support of sustainable targets. A deep understanding of each building will be realized and integral to our decision making process through an established Building Assessment Task Force. (National Goal 3) GSA will lead the private sector in new innovation by incorporating sustainable strategies into each project and leverage our ability to drive markets and partner with all levels of stakeholders. (R9 Goal) 	<p>chilling systems). (R9 Goal)</p> <p>Full R9 Future State</p>
--	---	---



[Full R9 Strategies](#)

<p>(1) Creation of a multi-disciplinary team (Building Assessment Taskforce) who are responsible for instituting a dynamic building-by-building analysis, whole building assessment, and project roll-out</p>	<ul style="list-style-type: none"> Siloed decision-making Relative time of project strategy development and implementation in relation to meeting goals. Limited financial analysis of project benefits to date (simple payback) to understand entire sustainability benefit. 	<p>PA All BA54 projects will utilize and follow the Building Assessment Taskforce results once approved by Senior Leadership.</p>	<p>First 15 - May 13, 2013</p> <p>Balance of portfolio: July 2013</p> <p>Move to regular review cycle. On-going after July 2013</p>
--	--	--	--

<p>strategy for the entire portfolio.</p>	<ul style="list-style-type: none"> ▪ Unique dynamics within each building and cumulative effects of past projects. 	<p>Full Blue Icon Legend</p>	
<p>(2) Create a Project Standards Tenant Improvement Guideline and Checklist using the Whole Building Design Guide and Integrated Design Process framework.</p>	<ul style="list-style-type: none"> ▪ Silo'ed Decision-making ▪ Dynamic nature of sustainable product market ▪ Limitations of FAR from contract perspective ▪ Difficulty in assigning blanket requirements for dynamic projects ▪ Conflicting agency goals, agency resistance, and singular vision ▪ Numerous internal applications with little or no data interchange and repetitive data entry ▪ Lack of consistent information about the portfolio ▪ Traditional project focus - time and money (i.e. Performance Measures) verses holistic building approach ▪ Lack of current educational programs ▪ Treatment of sustainability in projects as an "add-on" vs. fundamental component 	<p>MT Establish an on-going Project Standards Multidisciplinary Team to create a sustainably-maximized, streamlined project implementation process (planning, design, construction, building occupancy, and operations) through the use of a Tenant Improvement Projects Standard Guideline and checklist (one for each phase of implementation)</p> <p>IDP Use a typical critical path method (CPM) outline and gPM principles to identify players involved and how each CPM item will be addressed.</p> <ul style="list-style-type: none"> ▪ Energy and Sustainability Branch to develop complimentary standard list of checkpoints to ensure maximum sustainable performance. ▪ Include gPM-related Quality Assurance considerations and performance-based standards in all documents and processes. ▪ Establish standardized palettes (paint, carpet, ceiling tiles, etc.) for buildings to eliminate patchwork treatment and visual appearance - make them the standard for all projects. ▪ Establish a performance standard for lighting, HVAC (diffusers, engineering and addition to systems), plumbing, and connection to BAS/Balancing when appropriate. ▪ Determine sustainable performance standards for all commonly used products (carpet, paint, etc.) to include considerations like: locally sourced, reduced packaging, low VOC, etc. Align with Supply Chain efforts. ▪ Determine sustainable contractor practices (i.e. covering supply vents during construction) common to most projects and provide to contracting team. 	<p>Initial Project Standards Team meeting Q3 FY 2013</p> <p>Other targets to be set by team as actions are developed</p>

- Project Teams unfamiliar with sustainable requirements

- Provide standard for integration with larger building systems and utilize how-to from Project Retrofits Guideline.

IDP Carefully consider and outline the consistent inclusion of building (O&M staff and GSA Building Management) and other pertinent contributors (utilities, agencies, customers, etc) into the process, as well as, when they participate throughout the project implementation process.


- Customer interaction – Determine optimum points of customer interaction during planning, design, construction, building occupancy, and operations. RAMS and NAMS to be engaged early in the design process for all TIs over \$15,000.
- On-site Operations and Maintenance - Determine optimum points of Operations and Maintenance staff interaction during planning, design, construction, building occupancy, and operations.
- Building Management – Consistent and dedicated involvement throughout the process (potentially around critical inspections).


MT IDP The Pre-design/Design phase will include considerations for:

- See preceding Building Assessment/BA 54 description
- All Tenant Improvement projects affecting space layouts must be reviewed for Workplace Transformation opportunities and potential alternative financing through the program.
- Use the Sustainable Facilities Tool for all applicable project development.
- Require careful consideration of all systems and building conditions throughout the implementation process. Specific points during design to be identified in the project plan for this whole building approach (i.e. new VAV boxes installed, then assess overall HVAC for a given performance period).

Updated layered as-builts must be provided for all

projects containing upgrades to: lighting, plumbing, HVAC, fire-proofing, abandon in place, etc. with standard for consistent, required updating as projects are executed. Institute mandatory as-built drawing delivery upon project completion.

 Include important, related programs (being developed by other teams) in the guideline, like the C&D diversion and carpet recycling programs and set standard reporting and tracking.

 Develop method for tracking project information to assist with:

- Enterprise Communications Team publications/promotion
- Business Case developments around specific technologies to enhance understanding and future application of projects, as well as, create customer buy-in.
- Technical division project packet (turnover packets).
- Case study reporting - to be used for Sustainable Facilities Tool publication and for R9 future project development. To be housed on One-Stop-Shop. In short, to formalize and utilize post-mortem analysis in all applicable ways.
- Awards and honors applications

Contractor Evaluation and C-PARS system improvements:

- Evaluation notes will be developed throughout the project life cycle at three (3) critical points minimally: prior to bid, during construction (CPM inspections), and after project completion. Design a corresponding comprehensive evaluation form (Prime and Subcontractors) that guides this CPM evaluation).
- All evaluations will be required to be uploaded to the central database contractor system (C-PARS).
- A C-PARS how-to-guide is to be created and uploaded to the One-Stop-Shop.

Regularly re-evaluate the guideline and checklist.
Ensure that all MT developed documents are posted on the One-Stop-Shop.


[Blue Icon Legend](#)


(3) Establish Project Standards Multi-disciplinary Team to drive processes, systems, resources, and tools improvements.


- Silo'ed Decision-making
- Dynamic nature of sustainable product market
- Difficulty in assigning blanket requirements for dynamic projects
- Numerous internal applications with little or no data interchange and repetitive data entry
- Lack of consistent information about the portfolio
- Treatment of sustainability in projects as an "add-on" vs. fundamental component


Develop list of reporting systems requirements and work with national office to optimize the programs and resulting reporting.

Investigate current databases for project-related information and find maximized approach (a digital database intended for O&M manual updating and any other project-related documentation). Research all current systems and their capabilities as a baseline (eSMART, EDMS, etc.).

 Participate on Contracting multi-disciplinary team to improve solicitation process and all contracts affecting projects.

 Participate on Operations and Maintenance multi-disciplinary team to maximize operational excellence and post-project performance.

 Provide content and recommendations for the R9 Sustainability Plan One-Stop-Shop.











 Develop projects around customer sustainability goals utilizing the Enterprise Account Program.



Develop a region-level resource group who can provide technical support and a focus to sustainability throughout the project.


[Blue Icon Legend](#)


Initial Project Standards meeting
Q3 FY 2013.

Other targets to be set by team as actions are developed


<p>(4) Improved education and training specific to project installations.</p>	<ul style="list-style-type: none"> ▪ Lack of current educational programs ▪ Project Teams unfamiliar with sustainable requirements 	<p> Use Project Standards Team (as found in previous strategies) to outline necessary certifications and training and their link to performance.</p> <p>  Research online training, mentor programs, and other creative tools to be considered by Education Team.</p> <p> Develop informational criteria on GSA's changing methodologies and goal expectations with contractors developing and executing contracts.</p> <p> Create a standard for vendor/contractor post-installation training and education around specific technologies used in projects and incorporate into the associated contracts.</p> <p>  Develop customer information sessions to bridge installation and post installation use and how the customer can best support success of the project.</p> <p> Work with Workplace Transformation to understand program, long-term savings and alternative financing opportunities, and leverage WPT for every possible project.</p> <p>Blue Icon Legend</p>	<p>Initial Project Standards Team/Education Team meeting Q4 FY 2013</p> <p>Other targets to be set by team as actions are developed</p>
<p>(5) Formalize and develop accessible, general sustainability training/educational opportunities.</p>	<ul style="list-style-type: none"> ▪ General skill gap ▪ Understanding of sustainability 	<p> Create curriculum-based sustainability training for facilities managers. Look for opportunities to count toward industry certifications.</p> <p> Targeted educational programs and outreach for general technical, standards and policies and customer preferences for audiences across all teams and applicable business lines.</p>	<p>Education Multi-disciplinary Team Q4 FY 2013</p> <p>Other targets to be set by team as actions are developed</p>

		<p> Develop customer-focused information sessions regarding GSA goals, R9 Sustainability Plan, and the larger picture of our impacts.</p> <p>Specific training for programs like LEED CI, etc.</p> <p> As part of the Regional Office and new 50 UNP location, build a shared Resource Library (Design and Construction, Energy and Sustainability Branch, Portfolio Management Division, etc.) to be available to all GSA R9 personnel which will facilitate the advancement of sustainable projects across the Region.</p> <p>For specific project strategies, use local project prototypes to engage and demonstrate sustainable attributes to customers.</p> <p>Blue Icon Legend</p>	
--	--	--	--

<p>(6) Recommend practices and procedures to incentivize and drive sustainable behavior by our tenant agencies in owned and leased space. (Incentivizing Customers flow chart)</p>	<ul style="list-style-type: none"> ▪ OMB policy and procedures pertaining to agency rent budgets, GSA Pricing Policy and how rent is charged, and the ability to quantify energy savings in multi-tenanted buildings ▪ Lack of continuity between various agency sustainability goals 	<p> Develop a PBS multi-discipline team consisting of members from Field Offices, READ, Service Centers (Property Management), Portfolio Management and Client Solutions to determine specific actions.</p> <ul style="list-style-type: none"> ▪ Examine rent policy ▪ Examine overtime utilities and develop ways to engage users in energy-saving strategies ▪ Build business cases for retrofit project strategies which lend themselves to RWA funding, to work with enterprise account management program ▪ Request engagement at national level ▪ Develop specific ROI tenant policy and roll out universally ▪ Work with Workplace Transformation and Alternative Financing teams to develop specific incentive strategy 	<p>12-24 Months</p>
---	---	--	----------------------------

<p>(7) Improved Operations and Maintenance to support sustainable strategies (customers, region, field office, and contractors). (O&M Standards & Enhancement of Skills)</p>	<ul style="list-style-type: none"> ▪ Customer demands overriding sustainable initiatives ▪ Mis-use of subcontracted support which inhibits understanding and implementation of sustainable practices. ▪ Older buildings are in need of increased funding to replace or refurbish existing equipment. ▪ Fear of adopting new technology. ▪ Resources (funding and personnel) 	<p> Assemble an Operations and Maintenance Multi-Disciplinary Team focused on developing methods and actions to:</p> <ul style="list-style-type: none"> ▪ Address the way we do business and reset the way we look at our surrounding environment, expected standards of performance, and increase collaboration from a sustainable perspective to succeed. ▪ Address the lack of clear roles and responsibilities for the implementation of sustainability. ▪ Identify what resources can be leveraged internally and what additional resources are needed. For example, identify necessary skills to operate equipment for current and future building inventory and work with the Educational group to develop appropriate programs. ▪ Develop contract clauses and stipulations that allow for the proper management of O&M staffs, as well as a management system for the O&M subcontractors, with regard to sustainable projects and post-maintenance. ▪ Provide an overview of what the impacts of the approaches developed can have, a method of tracking progress against those approaches, and details regarding how we can best capitalize on our assets. ▪ Provide a time line for implementation. (this should be in concert with the rest of the plan strategies). <p>Develop a minimum standard for sustainable operations at each building and work with the Field Offices and Contracting Officers to establish an effective Quality Assurance plan.</p> <p>Blue Icon Legend</p>	<p>Q4 FY 2013</p>
---	--	--	--------------------------

<p>(8) Re-evaluate technical review and</p>	<ul style="list-style-type: none"> ▪ Existing perception that technical 	<p>Re-examine environmental (compliance and IAQ) review</p>	<p>Q2 FY 2014</p>
--	--	---	--------------------------

input into projects	reviews delay the construction process.	<p>process.</p> <p> Educate project teams on project benefits resulting from more robust reviews. Potential impacts to include:</p> <ul style="list-style-type: none"> ▪ Decrease in project execution time line ▪ Increase in tenant satisfaction and ease of overall project delivery ▪ Increase in overall compliance and quality of construction ▪ Increase in ease of long-term operations and efficiency <p>Blue Icon Legend</p>	
(9) Create Sustainability Reviews for applicable projects	<ul style="list-style-type: none"> ▪ Few technical/sustainability experts currently on staff ▪ Additional review may lead to potential increase in review time 	<p>Sustainability Checklist for Tenant Improvements to be developed by Energy and Sustainability Branch.</p> <p>Provide ability to request region-level sustainability reviews - available to all field office TI project teams.</p> <p>Educate project teams on project benefits resulting from more robust reviews. Potential impacts to include:</p> <ul style="list-style-type: none"> ▪ Decrease in project execution time line ▪ Increase in tenant satisfaction and ease of overall project delivery ▪ Increase in overall compliance and quality of construction ▪ Increase in ease of long-term operations and efficiency. <p>Blue Icon Legend</p>	Q4 FY 2013
(10) Increase sustainability considerations within compliance criteria and minimum standards.	<ul style="list-style-type: none"> ▪ Lack of consistent platform and delivery of sustainability requirements and goals for contracting vehicles. 	<p>Influence and implement improved P100 by participating in Central Office related panels and boards and driving for continued enhancement of sustainability-focused language.</p> <p>Continue to drive to higher levels of certifications (e.g.</p>	<p>Initial Project Standards Team with Energy Branch and Design and Construction Meeting</p> <p>Q4 FY 2013</p>

LEED, Energy Star) using National Strategic Plan goals and understanding of available standards in the market.

[Blue Icon Legend](#)

(11)

Drive sustainability in procurement to become a priority in all purchasing decisions

- Lack of financial, time, and man-power resources.
- Lack of consistent platform and delivery of sustainability requirements and goals for contracting vehicles.
- Lack of training/understanding in how to assess and verify sustainable requirements in all contracts.
- Procurement is executed across the organization making operational control more challenging.
- Resistance to change from employees to contractors.
- Lack of continuity with project leadership and resulting missed opportunities to work collaboratively on sustainable objectives.
- Meaning of 'sustainability' is not clearly understood by all.
- Cultural myths and assumptions about cost of sustainable products and services.



Create joint Project Standards/Acquisition Management Multi-disciplinary Team to:

- Clearly define sustainable procurement. (For this use Small Business goals and tracking methods as an example of how to classify multi-level, dynamic requirements.)
- Once definition in place, determine educational program for acquisition workforce, create how-to communication guide for internal and external stakeholders, and determine method for reporting and tracking that standards are met.
- Establish PBS-related Regional BPAs and IDIQs, which foster the selection of vendors that include experience and past performance, as well as, how to achieve our sustainable goals and greening initiatives.
- Improve existing IDIQ pool of A/E, CM, Construction Services, and enlist performance-based criteria in contracts to ensure sustainable savings.
- Contracting Plan team with Small Business Development staff will work with field office representatives to determine strategic approach to enhancing the overall skills of 8(a) contractors, and specifically, their ability to provide sustainable projects.
- Develop SOW guidelines for contractors to provide sustainability plans, when appropriate.
- Develop a platform to identify best practices and share regional success stories (may request Enterprise Communication Team participation).
- Provide economic incentives to contractors to implement sustainable practices, when appropriate.

Promote continued use of FSSI BPAs for all office

Q4 FY 2013

		<p>supplies, furniture, etc.</p> <p>Facilities Management & Services Programs Division to work with our major supply/service bases (within NISH, now Ability One) to help drive sustainability into their practices/products/services. Possibly leverage existing regional partnership agreement to incorporate sustainable elements into the joint performance goals.</p> <p>Develop contract sustainably-related clause review process to ensure applicable clauses are included. Where applicable (mainly for projects) submit all contracts for sustainability technical review (as outlined in previous strategy).</p> <p>Blue Icon Legend</p>	<p>In process and on-going</p> <p>Q1 FY 2014</p> <p>Contract Review - determine by Q4 FY 2013</p>
--	--	---	--

<p>(12) Learn about and leverage plug load/power strip program (under development). (Plug Load Initiative)</p>	<ul style="list-style-type: none"> ■ Funding 	<p>Post Phase 2 work station-specific pilot, utilize specification standard in tenant improvement contracts. Revisit Tenant Improvement Guideline to include standard.</p> <p>Blue Icon Legend</p>	<p>Post Phase 2 of Plug Load Initiative</p>
--	---	--	--

[Back to Top](#)



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> Met diversion goals as outlined in the National Plan: (accumulated waste diversion in FY2013) R9 has a diversion rate of 61%. Several options have been developed for Field Offices to manage waste (eg. source reduction, recycling, landfilling)." Region 9 Personal Property Division has reused, recycled or otherwise facilitated reutilization, recycling or kept out of the landfill \$517 million dollars worth of property (99% of FAS target goal for FY2012). 	<ul style="list-style-type: none"> Recycling, composting, reuse, affecting waste stream via front end procurement- all reside in different divisions within PBS/FAS. Personal Property coordinates with FAS Customer Account Representatives to improve outreach to agencies. Vendor availability for diversion services limited in Municipal Statistical Areas. 	<ul style="list-style-type: none"> Personal property provides well-defined program for reuse. Utilizing internal agency-to-agency transfer of usable goods, donations to State agencies and auction sale to general public to repurpose items. Targeted waste diversion program exceeding annual expectations and setting influential programs. <p style="text-align: right;"> Full R9 Current State Full R9 Building Assessment </p>

FUTURE STATE

DRIVING GOALS	BUILDING-BY-BUILDING	OVERARCHING
<ul style="list-style-type: none"> National Strategic Plan Goal Summaries R9 Sustainability Dashboard 50% diversion rate attained in Region 9 by 2015. R9 will reach 75% waste diversion in CA by 2020." <ul style="list-style-type: none"> (National Goal 2, Part 2) (National Goal 5) (R9 Goal) Greater than 18% of GSA's owned and leased inventory (greater than 5,000 gross square feet) will incorporate sustainable practices found in the Guiding Principles for Federal 	<ul style="list-style-type: none"> Building level management will be empowered to make sustainable choices using real-time data and dashboards produced by advanced building automation systems (BAS) coupled with monitoring and diagnostic systems. (R9 Goal) 	<ul style="list-style-type: none"> GSA contract services will possess a complete understanding of the regional plan goals and strategies and drive sustainability in all contract actions. Projects will utilize power purchase agreements and other financial vehicles for investments in photovoltaic, fuel cell, turbines, and innovative technologies (e.g., seawater chilling systems)." (R9 Goal)







[Full R9 Strategies](#)

<p>(1) Collaborate with EPA to enhance and promote innovations in diversion</p>	<ul style="list-style-type: none"> Resources (personnel) 	<p>MT Leverage Intra-agency Council</p> <p>IDP E Conduct a temporary detail to EPA to:</p> <ul style="list-style-type: none"> Develop specific waste prevention program enhancements Align with EPA subject-matter experts <p>Full Blue Icon Legend</p>	<p>Q4 FY 2013</p> <p>Q4 FY 2013</p>
<p>(2) Implement Carpet Recycling Program</p>	<ul style="list-style-type: none"> Resources (personel and funding) 	<p>BCD Build new program – determine baseline of current recyclable verses non-recyclable carpets used. Set targets and goals. Develop strategic plan including all levels of building projects (new construction/major renovation, building retrofits, and tenant improvements). Discrete program for tenant improvement to be considered</p> <p>Full Blue Icon Legend</p>	<p>TBD</p>
<p>(3) Find alternative ways to continue highly effective waste audits (previously funded by Central Office)</p>	<ul style="list-style-type: none"> Resources (personnel and funding) 	<p>PA Use already completed audits as a template to build audits and plans for the balance of the portfolio (using rolling assessment strategy).</p> <p>Utilize MARS reviews to support Quality Assurance of</p>	<p>Q1 FY 2014</p> <p>Q1 FY 2014</p>

		audits.	
		Full Blue Icon legend	

(4) Waste diversion program to assess state-by-state recycling and composting capacity (vendor availability).	<ul style="list-style-type: none"> Resources (personnel and time) Potential added contract costs 	<p>A Set target for California at 75% diversion rate and Nevada for 60% diversion rate by FY2020</p> <p>A BCD Continued evaluation of Arizona and Hawaii for capacity (market conditions) and supporting state policy changes</p> <p>BCD Engage MSA (Metropolitan Statistical Area) to drive GSA's intention to be a leading customer for recycling services</p> <p>Conduct on-site composting pilot at the Chet Holifield Federal Building, Laguna Niguel, CA.</p> <p>Full Blue Icon Legend</p>	Q1 FY 2014
--	--	--	-------------------

(5) Continue to drive e-waste initiative	<ul style="list-style-type: none"> Resources (funding) 	<p>E National Strategy for Electronics Stewardship</p> <p>EAM E Using e-waste event guidelines to continue to engage tenants and GSA</p> <p>E PA A Create a database to collect historical data from each e-waste pick up with detailed information regarding the recycled materials along with the cost and energy savings to engage building tenants (ZEF).</p> <p>BCD On-going assessment of local entities recycling of e-waste to continue through the life cycle of the products.</p> <p>A Adherence to written guidelines to ensure that each</p>	Q4 FY 2013 - Q4 FY 2015
---	---	--	--------------------------------

		<p>item is properly recycled within its corresponding state, avoiding landfill</p> <p>  Property managers and building personnel use developed business case for e-waste event production by MSA (Metropolitan Statistical Area).</p> <p>Create an e-waste event toolkit and pilot at regional office.</p> <p>Full Blue Icon Legend</p>	
(6) Enhanced program reporting and tracking	<ul style="list-style-type: none"> ▪ Limited tracking of information currently 	<p> All program development data to be housed on One-Stop-Shop.</p> <p> Provide GHG data to R9 Dashboard.</p> <p>Full Blue Icon legend</p>	Q1 FY 2014
(7) Work with Project Standards team to add requirements to Project Guidelines and Checklists.		<p>Provide waste prevention guideline and checklist elements to Project Standards Team for each of the 3 Roadmaps:</p> <ul style="list-style-type: none"> ▪ New Construction/Major Renovation ▪ Retrofits ▪ Tenant Improvements <p>Full Blue Icon legend</p>	See Project Standards Team time line

[Back to Top](#)



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> ▪ Space Management in the forefront of our efforts ▪ Some training in place on greening of leased inventory ▪ Routine inspections are conducted to ensure clauses are carried out ▪ Lease locations with a high energy intensity rate are tracked and incorporated into R9's overall energy consumption ▪ R9 is moving away from issuing non-fully serviced leases 	<ul style="list-style-type: none"> ▪ Use strong design backgrounds to help with workplace transformation team and client solutions ▪ Safety and Environmental Management Branch no longer review leases prior to issuance 	<ul style="list-style-type: none"> ▪ LEED - 37 buildings / 46 leases <ul style="list-style-type: none"> ▪ Green Lease Clauses - 123 buildings / 128 leases ▪ Guiding Principle Compliant - (24%) 153 buildings / 167 leases ▪ Energy Star - 94 buildings / 141 leases ▪ FMCS Glendale: coordinating project development/ LEED CI ▪ Working with Client Solutions Division to roll-out customer education ▪ 38 green lease clauses <ul style="list-style-type: none"> ▪ Energy independence ▪ Recycle/Reuse ▪ Finishes ▪ Janitorial ▪ Recycle content and materials. <p style="text-align: right;"> Full R9 Current State Full R9 Building Assessment </p>

FUTURE STATE

DRIVING GOALS	BUILDING-BY-BUILDING	OVERARCHING
<ul style="list-style-type: none"> ▪ National Strategic Plan Goal Summaries ▪ R9 Sustainability Dashboard ▪ Greater than 18% of GSA's owned and leased inventory (greater than 5,000 gross square feet) will incorporate sustainable practices 	<ul style="list-style-type: none"> ▪ Increase density in Federal Buildings and dispose of excess or underutilized buildings: consolidate space, improve space utilization, increase telework participation, workplace design solutions, and disposal of excess or underutilized buildings. (National Goal 1) 	<ul style="list-style-type: none"> ▪ GSA contract services will possess a complete understanding of the regional plan goals and strategies and drive sustainability in all contract actions. Projects will utilize power purchase agreements and other financial vehicles for investments in photovoltaic, fuel cell, turbines, and innovative technologies

found in the *Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings*. ([National Goal 3](#))

- Ability to monitor, track and report green-leasing data in GSA systems with reduced effort and no redundancy

(e.g., seawater chilling systems). ([R9 Goal](#))

- R9 drives national performance in Guiding Principle Compliance, LEED certifications and Energy Star ratings











[Full R9 Future State](#)







[Full R9 Strategies](#)

[Green Leasing Plan](#)

<p>(1) Enhance Cost/Payback scenario</p>	<ul style="list-style-type: none"> ▪ OMB policy and procedures pertaining to agency rent budgets, GSA Pricing Policy on how rent is charged, and the ability to quantify energy savings in multi-tenanted buildings. ▪ Lack of continuity between various agency sustainability goals. 	<p>EAM Recommend practices and procedures to incentivize and drive sustainable behavior by our tenant agencies in owned and leased space. (Incentivizing Customers Flow Chart)</p> <p>MT Develop a PBS multi-discipline team consisting of members from READ, Service Centers (Property Management), Portfolio Management and Client Solutions to determine specific actions.</p> <p>Full Blue Icon Legend</p>	<p>Q4 FY 2013</p>
<p>(2) Remain nimble with the green advancements</p>	<ul style="list-style-type: none"> ▪ Energy Star and LEED ratings change frequently. GSA leases are currently not structured to change with them until the leases are replaced. ▪ Resources to deal with ever-changing green requirements and the current lease workload. 	<p>E Drive building owners to remain current on sustainable practices as they evolve by requiring on-going required compliance with Energy Star and follow up to LEED certifications. Use Strategies 4 and 5 to enforce, track and monitor.</p> <p>Energy and Sustainability Branch to confirm access procedure for lessors to share access to Energy Star Portfolio Manager accounts.</p>	

		<p>Work with the Energy and Sustainability Branch to establish a performance standard for lighting, HVAC (diffusers, engineering and addition to systems), plumbing, and connection to BAS/Balancing when appropriate.</p> <p>Full Blue Icon Legend</p>	
<p>(3) Provide education for internal and external stakeholders</p>	<ul style="list-style-type: none"> ■ Funding and Resources 	<p> During the monthly Thursday Training Sessions talk about what is “sustainable” for each topic presented or how it can be more so.</p> <p> Work with the Plan Education team to enhance offerings.</p> <p> Develop feedback surveys post related training sessions.</p> <p> Offer the READ training to the Plan Education Team to more broadly use with other parts of GSA</p> <p>  Continue to use Industry Days held in various cities around the region to educate on green lease requirements. Require at least two sustainable topics required for the agenda for the balance of FY2013 and have all topics discuss what is sustainable about them starting FY2014.</p> <p> Develop additional training on Energy Star (Education Team and Real Estate).</p> <p>  Leverage use of Client Enrichment Series presentations to our external customers to green lease requirements.</p> <p>Full Blue Icon Legend</p>	<p>End of FY 2013</p>
<p>(4) Focus and enhance enforcement efforts</p>	<ul style="list-style-type: none"> ■ No current capacity or mechanism in place to track needed 	<p> Capitalize on most recently executed contracts which require utility reporting to gauge performance.</p>	<p>Started by Q4 FY 2013</p>

	<p>information regarding compliance with lease clause requirements</p> <ul style="list-style-type: none"> ▪ Sub-metering is not available in most, if not all, leased buildings. 	<p>Use 3 key customers as business case development.</p> <p>  Develop the requirements for a tracking database with reporting capabilities utilizing a team from READ, field offices, and other areas as needed.</p> <p>Full Blue Icon Legend</p>	
<p>(5) Track and monitor green lease progress. Fully leverage inventory turnover to realize our sustainable goals for the R9 lease portfolio.</p>	<ul style="list-style-type: none"> ▪ No systems currently in place – currently all manual collection. ▪ Constantly changing nature of green clauses. ▪ No current capacity or mechanism in place to track needed information regarding compliance with lease clause requirements ▪ Sub-metering is not available in most, if not all, leased buildings. 	<p>Use current national office effort to audit all leases to create a baseline.</p> <p>Use national office G-REX system to go live in October 2013. It is being designed to capture the data as of Real Estate Leasing Program (RLP) issuance and will be dynamic to capture any changes to the clauses as they are made.</p> <p>Support national office efforts to examine the ability to link to EPA Energy Star databases to better track our Energy Star leased buildings for continued compliance.</p> <p>Request from national office to find similar capabilities with LEED/USGBC systems linkage.</p> <p>Full Blue Icon Legend</p>	<p>TBD</p> <p>To follow national office schedules</p>
<p>(6) Increase buy-in from our federal customers</p>	<ul style="list-style-type: none"> ▪ OMB policy and procedures pertaining to agency rent budgets, GSA Pricing Policy on how rent is charged, and the ability to quantify energy savings in multi-tenanted buildings ▪ Lack of continuity between various agency sustainability goals. 	<p> Recommend practices and procedures to incentivize and drive sustainable behavior by our tenant agencies in owned and leased space (Incentivizing Customers Flow Chart)</p> <p> Develop a PBS multi-discipline team consisting of members from READ, Service Centers (Property Management), Portfolio Management and Client Solutions to determine specific actions.</p> <p>Full Blue Icon Legend</p>	<p>Q4 FY 2013</p>



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> From FY03 – FY12, RPDD sold or transferred properties, including: <ul style="list-style-type: none"> Acres – 188.17 Properties – 46 Buildings – 2 Estimated Value - \$171,584,884 Proceeds - \$82,099,215 Value Proceeds - \$174,159,398 Provide comprehensive asset management tools, resources, and services for Federal Agencies. Develop cost-effective and efficient real property repositioning strategies such as: real estate portfolio consultation services, environmental support services, National Historic Lighthouse Preservation Act, utilization studies, Federal real property appraisals, public benefit conveyance compliance inspections, and base realignment and closure (BRAC) assistance. 	<ul style="list-style-type: none"> Organize public auctions to dispose of properties that cannot be conveyed to eligible recipients for public purposes. 	<ul style="list-style-type: none"> Decreased footprint equals decreased energy use. GSA impact is direct. <p style="text-align: right;"> Full R9 Current State Full R9 Building Assessment </p>

FUTURE STATE

DRIVING GOALS	INTEGRATED PROCESS	BUILDING-BY-BUILDING
<ul style="list-style-type: none"> National Strategic Plan Goal Summaries R9 Sustainability Dashboard Greater than 18% of GSA's owned and leased inventory (greater than 5,000 gross square 	<ul style="list-style-type: none"> GSA's path to sustainability begins with embracing an integrated approach to all projects. Once the integrated design approach is institutionalized, sustainable practices will infuse all facets of building management and project development. Emphasis on alignment 	<ul style="list-style-type: none"> Increase density in Federal Buildings and dispose of excess or underutilized buildings: consolidate space, improve space utilization, increase telework participation, workplace design solutions, and disposal of excess or underutilized buildings. (National Goal 1)

feet) will incorporate sustainable practices found in the *Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings*. ([National Goal 3](#))

with workplace transformation is key. ([National Goal 3](#))

- Sustainability will be acknowledged as a fundamental guideline, rather than as a possible addition, for all building considerations. Whole building design will represent a pivotal shift for the conception and enlistment of value engineering in support of sustainable targets. A deep understanding of each building will be realized and integral to our decision making process through an established Building Assessment Task Force. ([National Goal 3](#))





[Full R9 Future State](#)



[Full R9 Strategies](#)

<p>(1) Provide disposal plans post building assessment analysis to determine full impacts of sustainable projects and initiatives (workplace transformation).</p>		<p>MT As part of existing responsibilities, provide impacts of potential disposal actions to sustainability considerations for owned assets.</p> <p>Work with Alternative Financing team to maximize potential of Exchange Authority - 41 CFR, Sub Chapter B, Part 102-39 Replacement of Personal Property Pursuant to the Exchange/Sale Authority.</p> <p>Full Blue Icon Legend</p>	<p>On-going</p>
--	--	---	------------------------

<p>(2) Advertise disposal</p>	<ul style="list-style-type: none"> ▪ Landholding agencies' culture of 		
--------------------------------------	--	--	--

- improved marketing strategies	keeping property in inventory regardless of contribution to the overall mission	<div>  Develop marketing plan in conjunction with the enterprise account efforts to assist with customer disposal. </div> <div> Full Blue Icon Legend </div>	TBD
(3) Support, via the multi-disciplinary team, Portfolio Management Division's efforts and effective subsequent disposal/reuse of space	<ul style="list-style-type: none"> Financial based decisions vs. sustainable current mechanism for calculation 	<div>   Continue to align with Portfolio Division - Asset Business Plan. </div> <div> Full Blue Icon Legend </div>	TBD
(4) Provide schedule of disposal actions to Dashboard Team.	<ul style="list-style-type: none"> Evaluation limitations (i.e. disposal checklist does not reflect energy issues). 	<div>  Provide schedule of disposal actions to Dashboard Team. </div> <div> Full Blue Icon Legend </div>	On-going

[Back to Top](#)

TRANSPORTATION

» Creating a Sustainable Fleet



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> As a mandated source, GSA facilitates nearly 100% of vehicle purchases for agencies using schedule GSA procures more than 60,000 vehicles annually at prices typically 26% below the manufacturer's invoice price The Short Term Rental Program offers customers an alternative to maintaining full-time vehicles when their needs are short term. <ul style="list-style-type: none"> The Short Term Rental Program has an hourly rental option (under development) 	<ul style="list-style-type: none"> A network of Fleet service representatives work on a daily basis to maintain each agency's fleet. 	<ul style="list-style-type: none"> R9 manages approximately 34,000 GSA Fleet leased vehicles, generating over \$101 million in annual savings (\$2,900 per vehicle) in comparison to operating costs for the same vehicles if managed by other agencies as owned assets <ul style="list-style-type: none"> Currently 17,001 vehicles (53%) are "Green" (E85, CNG, LPG, Hybrids, Low GHG and Electric) Federal fleets are required to obtain 75% of annual light-duty vehicle acquisitions as AFVs in MSAs <ul style="list-style-type: none"> In FY 2012, R9 ordered 5,161 lease replacement vehicles; 84% (4,827 AFV/Low GHG/Hybrids) are considered green. <p style="text-align: right;"> Full R9 Current State Full R9 Building Assessment </p>

FUTURE STATE

DRIVING GOALS	CUSTOMER-BY-CUSTOMER
<ul style="list-style-type: none"> The Federal Government as a whole has been tasked to increase consumption of alternative fuels from FY09 levels by 2015. (Goal 1, Part 2) Decrease GSA-owned fleet by 6%. Reduce GHG emissions from GSA fleet 5% below FY2008 levels by FY2020. (Goal 1, Part 2) Reduce consumption of gasoline and diesel to 30% below FY05 levels by FY20. Decrease GSA-owned fleet by 6%. (Goal 1, Part 2) 	<ul style="list-style-type: none"> GSA will partner with Federal agencies who maintain substantial internal fleet services and assist them in achieving the Presidentially-mandated goals, while continuing to achieve the same objectives with the internally-operated fleet. Financing options will be in place to incentivize customers making green fleet choices the standard choice. Customer fleet needs will primarily be facilitated by GSA. Innovative approaches, such as a car-sharing program, will be in full use.

- Increase overall market share among GSA and Federal Customers to 48% by developing partnerships with all customers in the achievement of our national fleet goals. ([Goal 1, Part 2](#))
- All agencies using fleet profiled and tracked. ([R9 Goal](#))
- 75% of Region 9 GSA fleet will be high efficiency fuel vehicles (30% of Federal Region 9 fleet will be high efficiency vehicles). ([R9 Goal](#))
- Track and monitor available alternative fuel sources and match to fleet composition ([R9 Goal](#))
- By 2015, increase consumption of alternative fuels by 159% from FY05 levels. Green fueling sources (E85, CNG, and electric power) will be easily accessible throughout most metropolitan statistical areas. ([Goal 1, Part 2](#))




- Enterprise Accounting Planning will provide a streamlined consolidation of services (including fleet), thus producing a superior customer service.
- All drivers will to drive green through the use of education and outreach programs.” ([R9 Goal](#))


[Full R9 Future State](#)



[Full R9 Strategies](#)

(1) Ongoing assessment of refueling stations status (E85) in the region (Currently 40% of total fuel usage)	<ul style="list-style-type: none"> ▪ Lack of adequate number of E85 refueling stations in some markets 	<div>MT</div> <p>On National Level continue to work with the Federal Energy Management Program (FEMP) to strategically increase local sources of E85.</p> <p>Develop quarterly report to track E85 being used.</p> <p>Full Blue Icon Legend</p>	<p>Continuous</p>
(2) Develop a strategic approach to car sharing by	<ul style="list-style-type: none"> ▪ Owned/leased inventory ▪ Interagency logistics ▪ Longer range planning 	<div>BCD</div> <p>Build a business case development using the pilot program and status of R9 fleet</p>	<p>July 1, 2013</p>

	<ul style="list-style-type: none"> ▪ Budgets ▪ Vehicle Types ▪ Spread out nature of agencies 	<p>anticipated MPG improvements will generate. Incorporate this information in agency-assistance efforts.</p> <p>   Profile five (5) key regional Federal Agency/Bureau fleet operations, assist/advise them on ways to reduce/downsize/replace current gasoline/diesel vehicles with electric/AFV/LGHG vehicles.</p> <p>Full Blue Icon Legend</p>	<p>Complete</p>
--	---	--	------------------------

<p>(6) Explore alternative options for agencies to fund “incremental cost” of AFVs/electric vehicles</p>	<ul style="list-style-type: none"> ▪ Incremental funding necessary for AFVs/electric vehicle purchasing 	<p> Market consolidation incentive program to customer agencies (e.g. GSA supplement of 10,000 hybrids).</p> <p>Promote Lifecycle – amortization of ‘incremental cost’ required when leasing an AFV/electric vehicle</p> <p>Full Blue Icon Legend</p>	<p>Q1 FY 2014</p> <p>Currently in place</p>
---	--	--	---

[Back to Top](#)



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> Customers can purchase sustainable products through GSA Advantage, Global Supply, MAS Contacts, and Some FSSI BPAs <ul style="list-style-type: none"> 100% recycled paper sold in Region 9 via GSA Advantage Saved \$32,400 taxpayer dollars FY 12 Personal Property Management Branch diverted from landfills \$504 million dollars of Federal property: <ul style="list-style-type: none"> \$485mil direct reuse through donation or direct agency transfer \$19mil sold as surplus personal property \$5mil donated through Computers for Learning GSA's Supplier Management IOA's monitor MAS and Global Supply vendor's compliance with contract terms and conditions <ul style="list-style-type: none"> Environmental related compliance is reviewed (identification of environmental attributes) and the proper identification thereof WOC IOA's responsible for approx 4,900 contracts 	<ul style="list-style-type: none"> Network of Area Property Officers and Customer Service Directors provide outreach and training to all customers <ul style="list-style-type: none"> Launched Sustainable Facilities and Carbon Footprint Tools Supplier Management WOC <ul style="list-style-type: none"> 17 IOAs (located in California, Arizona, Texas, Colorado, Washington), 3 SIOA's, 2 MIOAs, and 3 Depot IOAs Monitors Compliance of MAS Contracts, Global Supply Contracts, and FSSI BPAs. Performs Pre-award and First Article Inspections Product Life Cycle Multi-Disciplinary Team <ul style="list-style-type: none"> Analyzes the acceptance, utilization, and disposal of products Determines whether appropriate sustainable measures are being incorporated into purchasing decisions 	<ul style="list-style-type: none"> Life Cycle Analysis not consistently being considered during procurement Sustainability requirements not currently written into contract requirements Acquisition staff needs further sustainability training Vendors need further support <ul style="list-style-type: none"> Education Sustainable Marketing Expertise <p style="text-align: right;"> Full R9 Current State Full R9 Building Assessment </p>

FUTURE STATE

DRIVING GOALS	OVERARCHING
<ul style="list-style-type: none"> All products, in the twenty-five (25) sustainability product categories¹, will be reviewed from a reuse/diversion perspective by regional personnel, where appropriate, from both the Federal Acquisition Service (FAS) and the Public Buildings Service (PBS). All products will be reviewed from a reuse/diversion perspective. 	<ul style="list-style-type: none"> Assist 100% of our customers meeting national goals and acquire sustainable products and services the right way. (R9 Goal) With the Green Purchasing Portal, GSA will provide an easy-to-use, comprehensive purchasing path for selecting cost-effective, highly-sustainable products. It will allow for comparison of products by financial,

- All electronic products offered through the various GSA procurement vehicles will be evaluated from an e-Waste perspective by regional personnel, where appropriate, from both FAS and PBS in an effort to support national efforts to lay the groundwork for improving the design of electronic products and enhancing America's management of used or discarded electronics.²
- All products in the twenty-five (25) sustainability product categories will be reviewed from a life cycle perspective. (Note: definition as provided by the Environmental Protection Agency (EPA) in its Life Cycle Assessment: Principles and Practice (May 2006)³)
- At least 95% of new contact actions in support of GSA operations and using GSA funds will require the supply or use of environmentally preferable products and services.

¹ Appliances, Building Finishes, Building Furnishings, Cafeteria Products, Cleaning Products, Construction Materials, Contracted Printing Services, Doors and Windows, HVAC and Mechanical, Landscaping, Lighting and Ceiling Fans, Lube, Oil, Hydraulic Fluid, & Grease, Miscellaneous, Non-Paper Office Products, Office Electronics, Paper Office Products, Park and Recreation, Personal Care, Plumbing Systems, Refrigeration and AC, Renewable Energy, Roadway Construction, Special Construction Products, Traffic Control, and Vehicle Products.

² See, <http://www.gsa.gov/portal/content/234565> and National Strategy for Electronics Stewardship (July 20, 2011)

³ See, <http://www.epa.gov/nrmrl/std/lca/lca.html>, LCA101 document, entitled "Life Cycle Assessment: Principles and Practice."

sustainable, and LCA value propositions and provides an ability to track and optimally assist customers while working in concert with the Sustainable Facilities Tool.









- Assist 100% of our customers to meet our national goals. Full collaboration with our customer to reach their goals and well designed education programs to support sustainable choice. Enterprise Accounting Planning will provide a streamlined consolidation of services (including supply chain), thus producing a superior customer experience.
- GSA will be at the forefront of market transformation by leveraging All market players such as the distributor, manufacturer, small business, and large business will be enlisted using customized approaches and leveraged into sustainable opportunities.
- Various national-level efforts are underway to increase green services and products. Region 9 is a key partner in the development and institutionalization of these efforts.
- Our vendor community fully trained in federal green purchasing requirements and sustainable practices. Fully developed vendor compliance program with environmental requirements and the proper identification of green products and services as well as reporting in place. Program in place for the marketing of sustainable products and services. Supplier Management and Customer Accounts Research working strongly together to enhance customer agencies and sustainable vendors understanding and relations.

[Full R9 Future State](#)






[Full R9 Strategies](#)








(1) Continued


<p>outreach and education by FAS customer service directors, PBS client service directors, and area property officers</p>		<p>   Provide CLP training that includes green purchasing and an explanation of current resources (e.g., Carbon Footprint Tool, Sustainable Facilities Tool)</p> <ul style="list-style-type: none"> ■ Provide 1800 CLPs ■ Increase amount of 100% recycled paper purchased through GSA's purchasing vehicles by 50%; track associated taxpayer and GHG Savings <p> Provide CLP training for Property Utilization and the associated systems</p> <ul style="list-style-type: none"> ■ Provide 300 CLPs <p> Track the amount of items, by original acquisition cost, recycled via Utilization, Donation and Sales.</p> <ul style="list-style-type: none"> ■ Confirm all actions correspond with overarching business goals. <p> Request assistance with learning enhanced uses for remote customer interface tools (i.e. telepresence technology). Enhance materials and presentations to best translate when these tools are necessary to use.</p> <p> Request additional internal Sustainable Facilities Tool training for PBS and FAS with sufficient advanced notice.</p> <p>Create baseline information on the Federal Green Challenge 100% recycled paper and use as distribution package. In a larger sense, continue to drive the Federal Green Challenge. as new initiatives develop.</p> <p>Full Blue Icon Legend</p>	<p>Ongoing</p>
<p>(2) Vendor outreach and education by IOA's (Industrial Operations Analyst) and GSA internal staff to help</p>	<ul style="list-style-type: none"> ■ Internal Resources and Central Office support 	<p> Develop formalized training to be given at vendor conferences, CAV (Contractor Assistance Visits), and through online webcasts.</p> <ul style="list-style-type: none"> ■ Federal Green Purchasing Requirements 	<p>Done by end of Q3</p>

<p>attain sustainability goals.</p>		<ul style="list-style-type: none"> ▪ Green House Gas Emissions ▪ Sustainable Practices ▪ Marketing your Green Products and Services ▪ Use of the Sustainable Facilities Tool and Carbon Footprint Tool ▪ Life Cycle Assessment ▪ Packaging, Packing, and Marking requirement to reduce lost, returns, and disposed shipments to the depots or consolidation points (to reduce the impact on the environment) ▪ EISA goals - Incorporate those goals into new contractor orientations using customer format. <p>E Further train IOA's and GSA internal staff responsible for conducting the training</p> <p>Full Blue Icon Legend</p>	
--	--	--	--

<p>(3) Establish a series of internal sustainable BPA's against current MAS schedules and incorporate environmental preferences and evaluation factors at the delivery and task order level. The BPA could be used for building projects in the region (i.e. for lighting, appliances, building furnishings and etc.)</p>	<ul style="list-style-type: none"> ▪ Lack of acquisition expertise to incorporate sustainable preferences, life cycle analysis, and evaluation factors 	<p>MT BPA MDT to be created.</p> <ul style="list-style-type: none"> ▪ Insert clauses about packaging requirements ▪ Develop roadmap to help GSA internally and customer agencies establish BPAs. <p>BCD PA Establish criteria for determining which regional projects would be better suited for sustainable BPAs</p> <p>Establish formalized procedures for publication of the opportunity (i.e. through e-Buy or FedBizOpps)</p> <p>Establish standardized sustainable preferences and evaluation factors for incorporation into the solicitation and/or requests for proposals</p> <p>BCD Solicit qualified vendors through GSA e-Buy through market surveys, request for information notices, and sources sought notices.</p>	<p>Q1 FY 2014</p>
--	---	--	--------------------------

		Provide monthly reports on purchases through agency specific BPAs. Write reporting requirements into contract language.	TBD
		Full Blue Icon Legend	
(4) Encourage agencies to establish sustainable BPA's against current MAS schedules and incorporate environmental preferences and evaluation factors at the delivery order and task order level for recurring products and services needed.	<ul style="list-style-type: none"> Central Office buy-in for establishing agency specific BPA's Lack of acquisition expertise to incorporate sustainable preferences, life cycle analysis, and evaluation factors. Reporting of purchases make through the agency specific BPAs 	<p>Establish formalized procedures for publication of the opportunity (i.e. through e-Buy or FedBizOpps)</p> <p>Establish standardized sustainable preferences and evaluation factors for incorporation into the solicitation and/or requests for proposals</p> <p>Full Blue Icon Legend</p>	TBD TBD
(5) Dedicate individuals to promote and improve the Computers for Learning Program (CFL)	<ul style="list-style-type: none"> The Computers for Learning program requires a legislative change to allow GSA to make the allocation decision. 	 Return participation to FY 11 level of \$8 million Full Blue Icon Legend	End of Q4 FY 2013
(6) Promote the use of sustainable products and advocate the use of sustainable evaluation criteria to outside agency clients who request GSA's interagency contracting services.	<ul style="list-style-type: none"> Assisted Acquisition Services (AAS) is non-mandatory and fee for service (AAS charges a percentage for its services) Evaluation criteria using sustainability as a factor would increase offerers' proposal preparation costs thus resultng in 	  Raise awareness of sustainability in interagency contracting and stress benefits to existing and potential clients. <ul style="list-style-type: none"> Identify clients who possess nexus between assisted acquisitions and furniture design/installation/workplace transformation Potential test case with Navy Procure services/commodities using sustainability as an 	Q1 FY 2013

<p>Move to model of reporting by customers rather than purchases.</p>	<p>higher costs</p> <ul style="list-style-type: none"> Internal resources for providing subject matter experts (sustainability technical support) for customers 	<p>evaluation factor.</p> <ul style="list-style-type: none"> Coordinate with Acquisition Operations Coordinate with Regional Council <p>Validation and verification reporting; feedback to MAS and ensure products are appropriately coded (FPDS-NG).</p> <p> Test case to be determined which will use evaluation criteria. BOR requirement might be used as a test case. R9 FAS leadership working on this test currently to include IT and professional services.</p> <p> Currently, R9 is working with EPA on topics like Life Cycle Assessments. Additionally, R9 is aligning efforts with the San Francisco Acquisition Roundtable (with USDA, COE, Forest Service). Investigate ability to leverage work with these two groups in support of this plan.</p> <p> Demonstrate use of the SF Tool in formulating client requirements.</p> <p>Create Sustainable AAS purchasing program.</p> <p>Full Blue Icon Legend</p>	<p>Q4 2013</p> <p>Q1 2013</p> <p>Q3 2013</p> <p>Q1 2013</p> <p>On-going</p>
<p>(7) Collaboration between CAR Supplier Management, Local OSBU Reps, and the SBA to bring sustainable vendors and customer agencies together for a total sustainable solution</p>	<ul style="list-style-type: none"> Additional Resources, and balancing current workloads 	<p>  Local vendor fairs to be facilitated by supplier management, customer accounts and research, and property disposal.</p> <p> Local Seminars for Vendors and Customer Agencies</p> <p> Solicit participation from the Small Business Administration</p> <p>Full Blue Icon Legend</p>	<p>On-going</p>

<p>(8) Work along with Central Office to further enhance compliance review of vendors specifically as it relates to environmental requirements and sustainable practices</p>	<ul style="list-style-type: none"> ▪ Vendors lack of understanding of environmental requirements (i.e. identification of environmental attributes and the proper identification thereof) ▪ Vendors self-certification/identification on GSA Advantage ▪ Lack of system resources to automate or monitor accuracy of environmental designations ▪ Due to budget constraints, many environmental programs are being put on hold (for example, USDA Bio-based certification). 	<p>Continue to work with Central Office on important items like: drilled down vendor reporting, enhanced understanding of vendors sustainable products and services, relation of products and services procured and the effect to GSA and customer sustainability goals, and ability for vendors to understand GSA/federal government requirements and enhanced collaboration to arrive at optimized products and services.</p> <p>Standardization of part numbers:</p> <ul style="list-style-type: none"> ▪ In FSSI standardizing part numbers - investigate auto coding specific part numbers with green attributes. ▪ Investigate change to supplier management in IAO reviews and verify part number aspect and include in (contractor assistance visits) as well as develop report showing tracking of it. <p>Full Blue Icon Legend</p>	<p>Q4 FY 2013 - FY 2014</p>
<p>(9) Gain a holistic understanding of products and services from a Life Cycle perspective</p>	<ul style="list-style-type: none"> ▪ PBS/FAS stove pipe approach. 	<p> Establish multi-disciplinary team. Potential team members; personal property, waste diversion and acquisition with cross-over to related initiatives (e.g. workplace transformation, direct procurement, etc) as needed.</p> <ul style="list-style-type: none"> ▪ Develop case studies where opportunities are available. ▪ Determine opportunities for reduced packaging policy recommendations, opportunities for sourcing local options, and looking at products from a waste diversion/re-use standpoint vs. simply a cost perspective. <p>Full Blue Icon Legend</p>	<p>On-going</p>

[Back to Top](#)

WORKPLACE TRANSFORMATION

» Optimizing Federal Footprint



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none">Comprehensive Workplace Transformation program is developed and being rolled out	<ul style="list-style-type: none">R9 maintains an extensive workplace transformation tool library.	<ul style="list-style-type: none">Completed and in process mobility models and workplace transformation spaces:<ul style="list-style-type: none">Completed - Regional Administrator and Senior Leadership (both PBS and FAS) and Staff Collaborative Workplace, 450 Golden Gate, San Francisco, CA – 3rd party review garnered exceptional scoring.Completed - Budget and Financial Management Space Realignment, 450 Golden Gate, San Francisco, CACompleted - Real Property Disposal Satellite office reconfiguration, Auburn, WAIn progress - GSA/50 United Nations Plaza (UNP), San Francisco, CAIn progress - United States Geological Survey (USGS) Science Campus, Flagstaff, AZIn progress - Health and Human Services (HHS) Office of Medicare Hearings & Appeals (OMHA), Irvine, CAIn progress - Department of Homeland Security Customs and Border Patrol (CBP), Tucson, AZIn progress - United States Geological Survey (USGS), Sacramento, CA <p>Full R9 Current State Full R9 Building Assessment</p>

FUTURE STATE

DRIVING GOALS	OVERARCHING	BUILDING-BY-BUILDING
---------------	-------------	----------------------

- Review portfolio and reduce federally-owned and leased space by **30% Reduction**. ([Goal 1, Part 1](#))
- **Energy, GHG and Water Goals:**
 - Major contributor to larger building goals
 - [Goal #1: Direct Source GHG Reduction](#)
 - [Goal #2: Indirect Source GHG Reduction](#)
 - [Goal #4: Water Use Efficiency and Management](#)
 - By FY2020, via reduced energy consumption, decrease direct source GHG emissions 28.7% below FY2008 baseline and decrease energy intensity and GSA owned federal buildings by 37.5 below the FY2003 baseline.
- **Sustainable Practices:**
 - [New Construction & Major Renovation](#)
 - [Retrofits](#)
 - [Tenant Improvements](#)
 - [Goal 3: Sustainable Design, Green Buildings, Local Planning](#)

[Full National Goals](#)

- Develop customer-facing hubs that allow inter-agency sharing of resources, including space and infrastructure, to result in cutting of costs and increased ease for public access to services. Enterprise Accounting Planning will provide a streamlined consolidation of services.

- Increase density in Federal Buildings and dispose of excess or underutilized buildings: consolidate space, improve space utilization, increase telework participation, workplace design solutions, and disposal of excess or underutilized buildings.” ([Goal 1](#))

[Full R9 Future State](#)



[Full R9 Strategies](#)

(1) Overall Strategy:

- Limited broad-based understanding

<p>Inventory Optimization: Use workplace transformation team analysis of possible 30% reduction efforts (Sustainability Goal for 2020 for the Pacific Rim Region)</p>	<p>of workplace transformation (internal and external).</p> <ul style="list-style-type: none"> ▪ Resistance to culture change, reduction in space and move from closed to open office layouts by Clients. ▪ Inability to enforce workplace change/recommendations/footprint reduction with Clients. ▪ Lack of a comprehensive, integrated offering/range of solutions. ▪ Limited staff and capabilities (untrained, not appropriate level of authority/influence, too many voices, etc.) analyzing opportunities, carrying message, preparing business cases and collateral, etc. ▪ The need to mirror, dovetail or coordinate regional workplace strategies/tools/efforts with national ones. 	<p>Working in coordination with FAS, develop business case template and tools to incorporate workplace transformation strategies (with options and packages) to be used in engagements with Clients.</p> <ul style="list-style-type: none"> ▪ Physical: This will include space configuration, direct reduction in rent/sf, increased awareness of sustainable practices. <p>Cultural: impacts to productivity and worker satisfaction, retention, and recruitment impacts, participation with sustainably-focused groups and events and overall attendance and sick days. Provide case studies/validation for cost-benefit analysis to OMB to support the release of funds.</p> <p>Use of Enterprise Account Management Program to engage tenants and reach 30% goal by 2020.</p> <p>Full Blue Icon Legend</p>	<p>End of Q2 FY 2014</p> <p>End of Q3 FY 2014</p>
--	---	--	---

<p>(2) Capitalize on existing workplace related initiatives and strategies to execute current workplace projects and use their success to source, validate, fund and</p>	<ul style="list-style-type: none"> ▪ Limited staff and capabilities (untrained, not appropriate level of authority/influence, too many voices, etc.) analyzing opportunities, carrying message, preparing business cases and collateral, etc. 	<p>Complete FY 2013 workplace engagements and mobility/collaboration projects throughout region including HHS Irvine, CBP Tucson, ICE San Diego, USGS Flagstaff and Sacramento, GSA offices in Las Vegas, San Diego, and San Francisco (50 UNP, HHS in SFFB).</p> <p>Form Multi-Disciplinary Communications and Workplace</p>	<p>On-going through End of Q2 FY 2014</p> <p>End of Q3 FY 2014</p>
---	--	---	--

<p>execute future projects</p>	<ul style="list-style-type: none"> ▪ Lack of a comprehensive, integrated offering/range of solutions ▪ Constantly evolving technology and innovation in workplace transformation tools, strategies, and approaches ▪ Inability to enforce workplace change/recommendations/footprint reduction with Clients ▪ Lack of available funding within GSA and Client agencies ▪ The need to mirror, dovetail or coordinate regional workplace strategies/tools/efforts with national ones 	<p>Transformation Team; include FAS, CSD, RCA, BFMD, PMD, READ/SMS; analyze and document projects.</p> <p>Develop case studies and uniform mechanism for capturing information that allows us to promote results we have achieved (especially highlighting success stories and low/no-cost solutions). Use 50 UNP as a comprehensive example.</p> <p>Analyze existing approach to completing workplaces for our Clients and recommend improvements (i.e. work with national office on gaps in P100 and improve it to include WPT strategies).</p> <p>Develop methodology to communicate and educate on workplace transformation, especially with regards to successfully-completed projects, through internal means (Townhall; Divisional Workplace/RCA presentations) and external (tours of the 450 GG mobility pilots, 50 UNP and client outreach, media materials).</p> <p>Clarify Message and Offering: What, really, is the offering or how to, as a unified team with an enterprise approach, figure out what the offering would be on a case-by-base basis? Refine the workplace tools, confirm available funding mechanisms and develop a one-stop approach including all contract mechanisms/FAS schedules including BPAs and other contract vehicles/Change Management/Occupancy Engagement/Excess of FF&E/Assisted Acquisition Services Funding and other financing options/Sustainable Facilities Tool, etc.</p> <p>Develop professional marketing/collateral materials (including a 'How To' guide) for workplace transformation in Region 9 that dovetails with national materials.</p> <p>Full Blue Icon Legend</p>	<p>End of Q2 FY 2014</p> <p>On-going through end of FY 2014</p> <p>End of Q3 FY 2014</p> <p>On-going through end of FY 2014</p> <p>On-going</p>
<p>(3) Establish multi-</p>	<ul style="list-style-type: none"> ▪ Limited broad-based understanding 	<p>Form Multi-Disciplinary Space Analysis and Client</p>	<p>End of Q1 FY 2014</p>

disciplinary teams to analyze our portfolio and use our client knowledge to identify and exploit additional workplace optimization opportunities with our clients

- of workplace transformation (internal and external).
- Resistance to culture change, reduction in space and move from closed to open office layouts by Clients.
- Inability to enforce workplace change/recommendations/footprint reduction with Clients
- Lack of available funding within GSA
- Incomplete or inaccurate Client data (including occupant counts by space and space layout data)
- Using a non-targeted approach with Clients
- Limited staff and capabilities (untrained, not appropriate level of authority/influence, too many voices, etc.) analyzing opportunities, carrying message, preparing business cases and collateral, etc.
- The need to mirror, dovetail or coordinate regional workplace strategies/tools/efforts with national ones
- Not identifying a true client need/benefit to capitalize on and justify the engagement

Outreach Team; include FAS, CSD, RCA, PMD, READ/SMS, RPUD, Building Assessment Taskforce and Service Centers; establish and validate the portfolio data (using Building Assessment Taskforce) to be used to identify, prioritize and target clients based on their "ready, willing, and able factors" as well as change in occupancy trigger points.

- Incorporate WPT clauses into competing lease actions

Develop client approach methodology based on the occupancy agreements expiring between now and 2020 (natural trigger point) or other space change request/opportunity. Differentiate the methodologies used between competed expiring leases and federal building occupants who are anticipated to renew in place. Incorporate CSD's Client Engagement Opportunity Flowchart and Enterprise Account Management Program.

EAM Establish project teams to develop a methodology for client interaction, applying targeted, concentrated, coordinated and multi-fronted effort where it will generate the greatest impact. Identify and seek client commitment to being workplace transformation within their organization and/or pilot projects.

Proactive deep understanding of cost drivers will help steer customers to pathways that will help them adopt program rather than scare them away.

Align with Project Standards Team to ensure workplace transformation solutions are considered in developed protocols.

Evaluate customer-driven parallel programs (e.g. IRS 3:1 desking project) and incorporate beneficial strategies into Workplace approach.

Full Blue Icon Legend

End of Q2 FY 2014**End of Q3 FY 2014**

<p>(4) Propose, promote and present policy change at a national level that not only mandates the optimization of our federal workplace but drives clients to GSA in order to best achieve that optimization</p>	<ul style="list-style-type: none"> ▪ Resistance to culture change, reduction in federal footprint, and change in policy from GSA stakeholders. ▪ Lack of available funding within GSA and Client agencies ▪ Evolving Client adoption/counter-actions that may mitigate effectiveness of, or need for, national mandate ▪ Lack of national GSA consensus on approach/magnitude ▪ Limited staff and capabilities (not appropriate level of authority/influence/familiarity with policy) carrying message, preparing business cases, etc. ▪ The need to mirror, dovetail or coordinate Region 9 workplace strategies with other regions, Central Office, and presidential objectives. 	<p>Form R9 Multi-Disciplinary Workplace Policy Team; include FAS, CSD, RCA, PMD, READ/SMS, Service Centers and RPUD to confirm commitment to reducing the federal footprint and methodologies, goals, timeframes, and deliverables of the workplace transformation team.</p> <p>Provide R9 Senior Leadership documentation to support the region's position for 30% footprint reduction and engage the process on a national level.</p> <p>Join or form cross-regional Workplace Policy Team: include senior representatives from FAS, CSD, RCA, PMD, READ/SMS, RPUD, and members of the Workplace PMO and Regional leadership; establish the need for workplace and cultural change in the government and agree on goals for reduction in the federal footprint and the need for a presidential mandate requiring this reduction.</p> <p>Develop national business case for policy, political, and expert support to reach 30% goal.</p> <p>National GSA Leadership approaches President with framework for mandated footprint reduction.</p> <p>Regional/national leadership and Workplace Transformation Policy Team develops policy for national workplace reduction (reducing federal footprint).</p> <p>Change similar regional policies that support the above national workplace recommendations ahead of national policy adoptions.</p> <p>Full Blue Icon Legend</p>	<p>End of Q4 FY 2013</p> <p>End of Q1 FY 2014</p> <p>End of Q2 FY 2014</p> <p>End of Q3 FY 2014</p> <p>End of Q4 FY 2014</p> <p>On-going through end of Q4 FY 2015</p>
--	--	---	--

[Back to Top](#)

WORKPLACE TRANSFORMATION

» Parallel Efforts



CURRENT STATE

GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> ▪ Use of alternative work schedules and telework to save taxpayer monies. FY 12 telework participation is 12.1% for PBS. ▪ Travel approval process refocused around mandates ▪ R9 telepresence is currently at 8% use (FY 12), which is considered high usage by Central Office. ▪ Mandated printer consolidation and removal of all individual printers instituted in Region 9 (FY 11). ▪ EDMS program currently being evaluated 		<p>Full R9 Current State Full R9 Building Assessment</p>

FUTURE STATE

DRIVING GOALS	OVERARCHING	BUILDING-BY-BUILDING
<ul style="list-style-type: none"> ▪ Energy, GHG and Water Goals: <ul style="list-style-type: none"> ▪ Major contributor to larger building goals <ul style="list-style-type: none"> ▪ Goal #1: Direct Source GHG Reduction ▪ Goal #2: Indirect Source GHG Reduction ▪ Goal #4: Water Use Efficiency and Mangement ▪ By FY2020, via reduced energy consumption, decrease direct source GHG emissions 28.7% below FY2008 baseline and decrease energy intensity 	<ul style="list-style-type: none"> ▪ GSA will reach a maximized level of use of AWS, telework and telepresence to support workplace transformation initiatives. (Goal 2, Part 1) 	

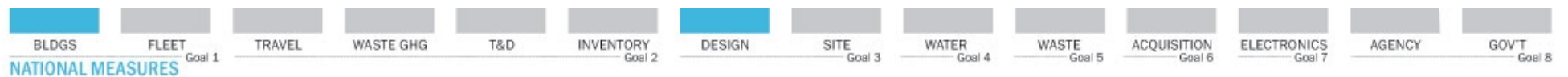
and GSA owned federal buildings by 37.5 below the FY2003 baseline.

▪ **Sustainable Practices:**

- [New Construction & Major Renovation](#)
- [Retrofits](#)
- [Tenant Improvements](#)
- [Goal 3: Sustainable Design, Green Buildings, Local Planning](#)

[Full National Goals](#)

[Full R9 Future State](#)



[Full R9 Strategies](#)

(1) Utilize printer consolidation, digital documentation, data center treatment, telepresence conferencing capabilities		<p>A Continued enforcement and monitoring of printer consolidation, digital documentation and telepresence efforts</p> <p>Full Blue Icon Legend</p>	On-going
--	--	--	-----------------

(2) Data Center Treatment	<ul style="list-style-type: none"> ▪ Data Center Inventory and Consolidation Plan (as listed in the National Strategic Sustainability Plan) is pending national office publication. 	<p>PA Develop efficient approach specific to the R9 building inventory when the plan and criteria are published.</p>	
----------------------------------	--	---	--

SUSTAINABLE COMMUNITY

» Community and Intra-Agency Outreach



CURRENT STATE

NEW	GENERAL	TEAM	SUSTAINABILITY
<ul style="list-style-type: none"> Definition - Sustainable Communities is a focus area intended to inspire a collective capacity to implement and strengthen sustainable approaches throughout the Pacific Rim Region. Potential collaborators include; state and local agencies, non-profit organizations, educational institutions, private industry, etc. Roundtables are currently being held to lay the ground work for this effort and an advisory council is being considered to formalize and provide a stronger platform for exchange between participants. In addition, sustainable efforts and the transformation of culture within GSA will be synergized through the use of Sustainable Communities. By providing a forum, Sustainable Communities will bring together various efforts in support of sustainability within the Region. (Community Outreach and Intra-Agency Outreach). 	<ul style="list-style-type: none"> Region 9 has begun participating in community-led 'roundtables' to learn from the sustainable practices of innovative thinkers throughout the design community. 	<ul style="list-style-type: none"> Region has created a Sustainability Council modeled after the national example. Using the National Green Team Guideline, a re-evaluation of the structure and depth of Green Teams has begun throughout the Region for the already-established regional team 	<ul style="list-style-type: none"> Most current efforts for the Regional Green team is event-based activities. The R9 Sustainability Council is the launching platform for this R9 Sustainability Plan. <p style="text-align: right;"> Full R9 Current State Full R9 Building Assessment </p>

FUTURE STATE

INTEGRATED PROCESS

- Utilize roundtables to formalize alliances with key industry partners. ([R9 Goal](#))
- Define the outline for GSA's social, economic, and environmental operations which will lead the agency to achieve all the sustainable goals as part of this plan. ([Triple Bottom Line](#))
- By 2020, the Pacific Rim Region will dramatically increase Small Business access and participation in government contracting.
- By 2020, the Pacific Rim Region will increase community outreach, educating and sharing best management practices in all areas found in the larger Region 9 Sustainability Plan (Buildings, Transportation, Supply Chain, and Workplace Transformation).
- By 2020, the Pacific Rim Region will develop several programs to promote and recognize sustainable efforts by its employees both within and outside their workplace.



OVERARCHING

- Aligned with regional and local planning entities in all MSA (Metropolitan Statistical Areas) to leverage mutual sustainability-focused programs, projects, and purchasing power. ([National Goal 3, Part 2](#))
- Established and active interagency coalition leveraging federal programs, purchasing opportunities with local municipalities' greening efforts, federal idea-sharing and promotion of GSA green programs with our customer agencies. ([National Goal 8](#), [National Goal 3, Part 2](#), and [R9 Goal](#))
- Federal idea-sharing and promotion of GSA green programs with our customer agencies will be a fundamental part of Enterprise Account Management ([National Goal 8](#) and [R9 Goal](#))
- Lead the market for targeted projects and programs by sharing business cases and lessons learned. ([R9 Goal](#))
- Align with all GSA national-level related programs (e.g., Federal Green Challenge). ([National Strategic Plan Goal Summary](#))
- Develop relationship strategies to drive sustainable markets and lead by example." ([National Goal 6](#) and [R9 Goal](#))
- Formalize education and training for implementation of national strategies. ([National Goal 1, Part 1](#) and [R9 Goal](#))
- GSA will have an active engagement program which will incentivize customers and continue to promote sustainable initiatives. ([R9 Goal](#))

[Full R9 Future State](#)




[Full R9 Strategies](#)



<p>(1) Align with the trend toward sustainable efforts throughout the community. Capitalize on GSA's unique ability to effectively influence given current sustainable efforts.</p>		<p>GSA led roundtables with various community partners to define areas of synergy and multiplicative effects with regard to sustainable efforts. Over 40 roundtables and meetings held to date.</p> <p>Support activities found in Transportation Roadmap to engage State led fuel station initiatives.</p> <p>Work with R9 Sustainability Plan Dashboard development to create an effective version for driving sustainable community with our external partners.</p> <p>Through the creation of an Advisory Council, establish intentional communities (networks) focused on improving the efficiency of everyday operations and leveraging all of the resources available (e.g. LA2030 Initiative and CA Green Building Initiative).</p> <p>Full Blue Icon Legend</p>	<p>On-going</p> <p>See Transportation Roadmap</p> <p>On-going</p>
<p>(2) Develop an interagency coalition leveraging federal programs, purchasing opportunities with local municipalities' greening efforts, federal idea-sharing and promotion of GSA green programs with our customer agencies.</p>		<p> R9 will convene an Sustainable Community multi-disciplinary team to develop a charter, mission and potential membership for the intra-agency council.</p> <p> R9 will use a Sustainable Community multi-disciplinary team to research possible state and local agency (planning, municipalities, etc) partnership opportunities..</p> <p>Full Blue Icon Legend</p>	
<p>(3) Sustainable Community will leverage existing programs and initiatives</p>		<p>With a restructuring of the R9 Sustainability Council, the Council will be tasked with staying connected to national level programs which can be leveraged across our five focus areas. The restructuring of the Council will include leaders in R9 Sustainability Plan development.</p> <ul style="list-style-type: none"> ■ Develop on-the-ground (i.e. Divisions and Field Offices) 	

		<p>participation via programs like: the Federal Green Challenge.</p> <p>Re-establish Industry Day program.</p> <p>Educate small businesses through outreach programs targeted to discuss our sustainability goals and objectives and how contractors can qualify to provide products and services to achieve GSA's and our customers' sustainability goals.</p> <p>Reinvigorate ZEF (zero environmental footprint) program. Convene multi-disciplinary team to determine specific actions.</p> <p>Full Blue Icon Legend</p>	<p>Q4 FY 2013</p> <p>On-going</p> <p>Q1 FY 2014</p>
--	--	---	--

(4) Promote auction and donation programs.	<ul style="list-style-type: none"> Specific legislative issue for the Computers for Learning Program (CFL) - see Supply Chain Roadmap for details. 	<p>Continue to support the robust Xcess and Acquisitions Operations Division Program with outreach to state and local government, nonprofit, and education partners, using the list to notify these stakeholders when unneeded federal property is available through donation programs or upcoming auctions. Also, continue to support Real Property Disposal Division in disposal of real estate assets.</p> <p>Full Blue Icon Legend</p>	On-going
---	---	--	-----------------

(5) Driving Sustainable Culture: Engage all GSA Region 9 employees in sustainable behavior throughout GSA-owned buildings. (Sustainable Community in Region 9)	<ul style="list-style-type: none"> Resistance to change Varying levels and ability to collaborate Responsibility of enforcement unclear Time and resources Lack of connection to larger goals 	<p>MT Develop, utilize, and promote the Pacific Rim Sustainability One-Stop-Shop as a vehicle for outreach and build a truly collaborative work environment.</p>	On-going
		<p>Offer incentives, such as increased mobility work, so employees realize an immediate benefit from working sustainably.</p>	On-going
		<p>Share employee or team 'success' stories that recognize</p>	On-going

	<ul style="list-style-type: none"> ▪ Limited metering and reporting capabilities; tenant level metering requires large investment in funding and time ▪ Tenant engagement is not permanently in any organization and the Steering Committee is a voluntary, collateral duty 	<p>sustainable behavior.</p> <p>Enforce regulations that limit personal electric appliances.</p> <p>Implement 1:14 printer ratio and set all printers to double-sided output.</p> <p>Ask GSA Region 9 management to sign a commitment pledge to actively support all sustainability initiatives.</p> <p> Where technically feasible, post dashboards for tenants to monitor and increase sustainable behavior while working in the building.</p> <p>Establish Tenant Engagement Outreach Program Management Office.</p> <p>Full Blue Icon Legend</p>	<p>June 1, 2013</p> <p>On-going</p> <p>June 1, 2013</p> <p>See Appendix A: Full Dashboard Analysis and Mock-up</p> <p>September 30, 2013</p>
--	---	---	--

<p>(6) Driving Sustainable Culture: Raise awareness with tenants about their impacts and engage them in sustainable behavior.</p>	<ul style="list-style-type: none"> ▪ Lack of accountability to facilitate sustainable behavior changes ▪ Few existing demonstration spaces 	<p>Tenant Engagement Outreach Program will provide Property Management communication campaigns to encourage tenants to use stairs, recycle, and reduce energy use.</p> <p> Work with Education team to offer an external web-based Tenant Engagement training that addresses the requirements of establishing a sustainable culture.</p> <p> Work with Workplace Transformation team to offer tours/open houses of GSA space that is configured to promote a sustainable, collaborative workplace.</p> <p>Incorporate a 'sustainability' item into tenant meetings. Frequent discussion on sustainable behavior will promote that behavior.</p> <p>Develop Workplace Transformation packages which demonstrate how to practically move to a sustainable</p>	<p>Q1 2014</p> <p>On-going</p> <p>On-going</p> <p>On-going</p> <p>On-going</p>
--	--	---	---

workplace.

Work with Field offices, Customer Incentive Team, and Waste Reduction Team to research and vet incentives to reduce energy usage and to recycle (e.g. recycling rebates).

Examine how IT Services can be offered and promoted to Agencies to support mobile work.

Determine which initiatives and actions within this Plan can be leveraged and how to work with EAM and the individual effort to maximize use with customers.

[Full Blue Icon Legend](#)

On-going

On-going

On-going

[Back to Top](#)

APPENDIX

Table of Contents

APPENDIX A	Full Dashboard Analysis and Mock-Up	i
APPENDIX B	Energy Use / Utilities Cost / Gross Square Footage Trend Analysis	xix
APPENDIX C	Costs and Savings	xxi
APPENDIX D	Greenhouse Gas Emissions	xxiii
APPENDIX E	Summary of National Strategic Sustainability Performance Plan	xxv
APPENDIX F	Triple Bottom Line	xxxvi
APPENDIX G	Building Assessment Taskforce	xli
APPENDIX H	Guidelines for Establishing a Multidisciplinary Team	xlvi

APPENDIX A

Dashboard

A key aspect of encouraging associates to make transformational change is actionable data. Allowing stakeholders to immediately see the impact of their energy decisions empowers them to make decisions that are aligned with our goals. To this end, Region 9 will utilize a dashboard populated with real-time data to inform and coach our tenants, management, and external stakeholders toward improving the sustainability of PBS's real estate portfolio. In its final form, this information will enable our customers to instantaneously adjust their behavior to reduce the environmental impact at the individual and agency level. While building management teams will employ this data to accurately pinpoint issues and effectively resolve them as they occur, our external stakeholders will have access to current and historical performance data in order to make macro-level decisions regarding funding, directives, and new legislation.

PBS has many goals and ways to measure the current state of and progress toward sustainability. As our business becomes more sustainably-focused, it is important to display our progress and current state into a format that can be easily understood and digested. Creating a dashboard that incorporates all facets of sustainability will enable associates to understand this information from a holistic perspective.

Immediately Available

Using the data systems available within the existing PBS infrastructure, Region 9 will create an interactive dashboard to make sustainability data easily accessible. Initially, this dashboard will be used internally by PBS to track and compare building performance, set strategy and identify trends. In the future, this dashboard could be made available to our tenants and, when appropriate, to the general public. The dashboard will reflect performance related to energy efficiency, water consumption, greenhouse gas (GHG) emissions, waste diversion, and tenant satisfaction. There will also be a sustainability index which is an indicator of overall sustainability performance. Data will be available at the national, regional, service center, field office and building level.

There will be two main "views" available to dashboard users. The Current View will reflect the most current status of the selected level (building, field office, service center etc) and compare that to other related units in its hierarchy. For example, if you drilled down to the building level, you would see the building-specific data for each of the different elements compared to the performance of that building's field office, service center, etc. There will also be options to view the data in total values versus percent change and overlay the current target onto the graph. The Historical View will show past performance for the specific element(s) chosen and will also have the options to view total values versus percent change and overlay historical targets.

Data Limitation and Strategies for Improvement

Energy & Water Data

Energy and water data is currently located in the Energy Usage and Analysis System (EUAS). The data is manually inputted from the utility bills. As a result of this process, the data we can display is two-to-

three months behind actual consumption and susceptible to human input error. PBS is in the process of installing and integrating energy meters at the building level that will feed real-time energy consumption data to the Building Automation System (BAS) and eventually, to the dashboard. A water meter project is soon to follow. When these metering projects are complete, the dashboard's value will increase significantly.

GHG Data

Greenhouse gas emissions are calculated annually in Central Office as required by OMB. It is a complicated process with factors that change based on zip code. As the water and energy data becomes timelier, we will need to work with Central Office to automate this calculation so that the GHG information can be made available to the users more frequently.

Waste Diversion

Waste-related data is calculated quarterly and only for certain buildings over 50,000 RSF. As PBS rewrites the scopes of work for our janitorial contracts, we are identifying and separating the costs for waste. This will help us accurately account for the cost of our waste management program. Cost data will be integrated into future versions of the dashboard.

Tenant Satisfaction

Current data shows the overall satisfaction rating for each building. Each building is surveyed once every three years. Tenant satisfaction is important to keep in mind as we “green” the portfolio. In the future, it would be helpful to tailor some of the questions to specifically address the sustainability aspect of the buildings.

Sustainability Index

The sustainability index provides a snapshot of the overall sustainability performance of a building or segment of the portfolio in relation the goals set by GSA or OMB. Each factor (energy, water, GHG, tenant satisfaction, and waste diversion) will be weighted based on relative importance. The weighting of each factor will be determined by a multidisciplinary team.

Obstacles

Although the data is available to launch a basic version of this dashboard, there are few obstacles that must be overcome. Each element of data is maintained in independent systems or in manual spreadsheets. In order to display all of this data in one place a centralized sustainability dashboard will be created.

Software and Programming

To create this dashboard, the sustainability team and PBS will need to enlist support from the CIO. There are many software programs available to assist businesses with creating this type of application. The PBS CIO is evaluating the alternatives is scheduled to select an enterprise-wide solution in July. If

this selection proceeds as scheduled, Region 9 will begin learning the program and creating the dashboard in August, 2013.

Future of the Dashboard

Region 9 recognizes there are several “blind spots” when it comes to measuring the sustainability of the business. As strategies are developed and implemented to improve our data, the dashboard can be enhanced in several ways to better inform ourselves and our tenants.

Sub-meters

By sub-metering discrete tenant-occupied spaces, HVAC equipment, lights, plug loads, common spaces, security and emergency evacuation systems, etc buildings managers will be able to make better decisions about when and how to run buildings systems. Tenants will be able to gauge the impact of their energy usage real-time. Eventually, PBS could monitor energy usage of individual tenants at the cubical level.

The dashboard will appear as a simplified and targeted desktop “widget” on the work screens of our tenants, continuously coaching them toward achieving a smaller environmental footprint. It will include data points regarding personal energy, water, GHG and waste consumption as compared to the average employee within their agency space and to the entire building population. Internal GSA associates will have access to real-time data via an interactive intranet site that compares building and portfolio data to historical trends, current performance and future goals. Having this information readily available will improve our reporting to external stakeholders as they set policy to further refine our environmental initiatives.

Space Utilization

PBS does not currently maintain an accurate count of the number of employees working in each building. This makes it difficult to measure the utilization rates within the portfolio. Central Office is researching ways to gather and maintain this information. This will help to further refine the picture of efficiency for our tenants and our buildings.

Employee View Point Survey

The Employee View Point Survey (EVS) is another valuable source for employee satisfaction within the federal government. Adding specific elements from this survey could help to improve the tenant satisfaction data and show how the federal government is incorporating sustainability into the workforce.

Telework

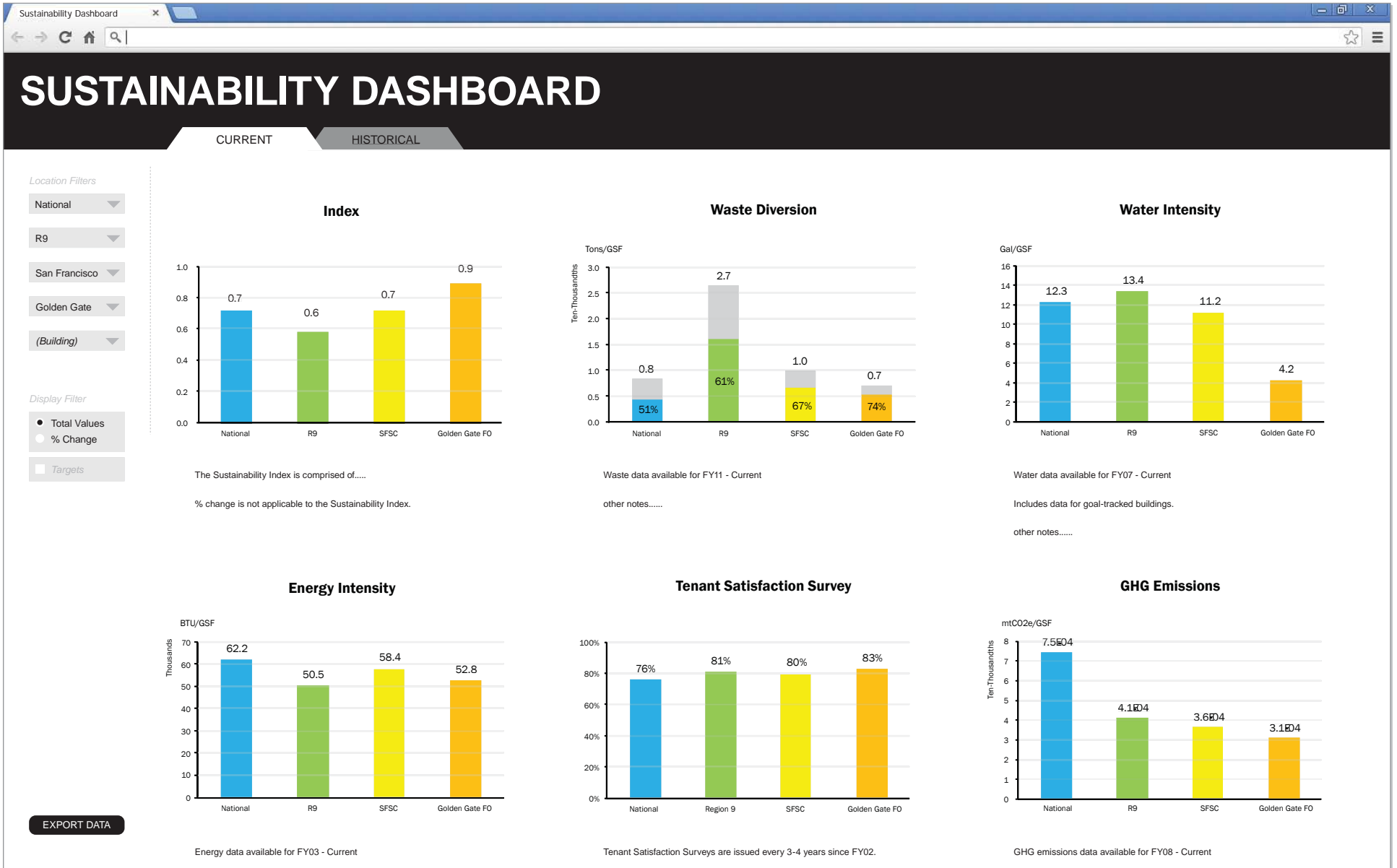
GSA has already developed an internal telework dashboard. In the future, GSA could incorporate this data for our tenants into the sustainability dashboard. This information will help to quantify the savings achieved through telework including reduced commuting costs and energy usage.

FAS

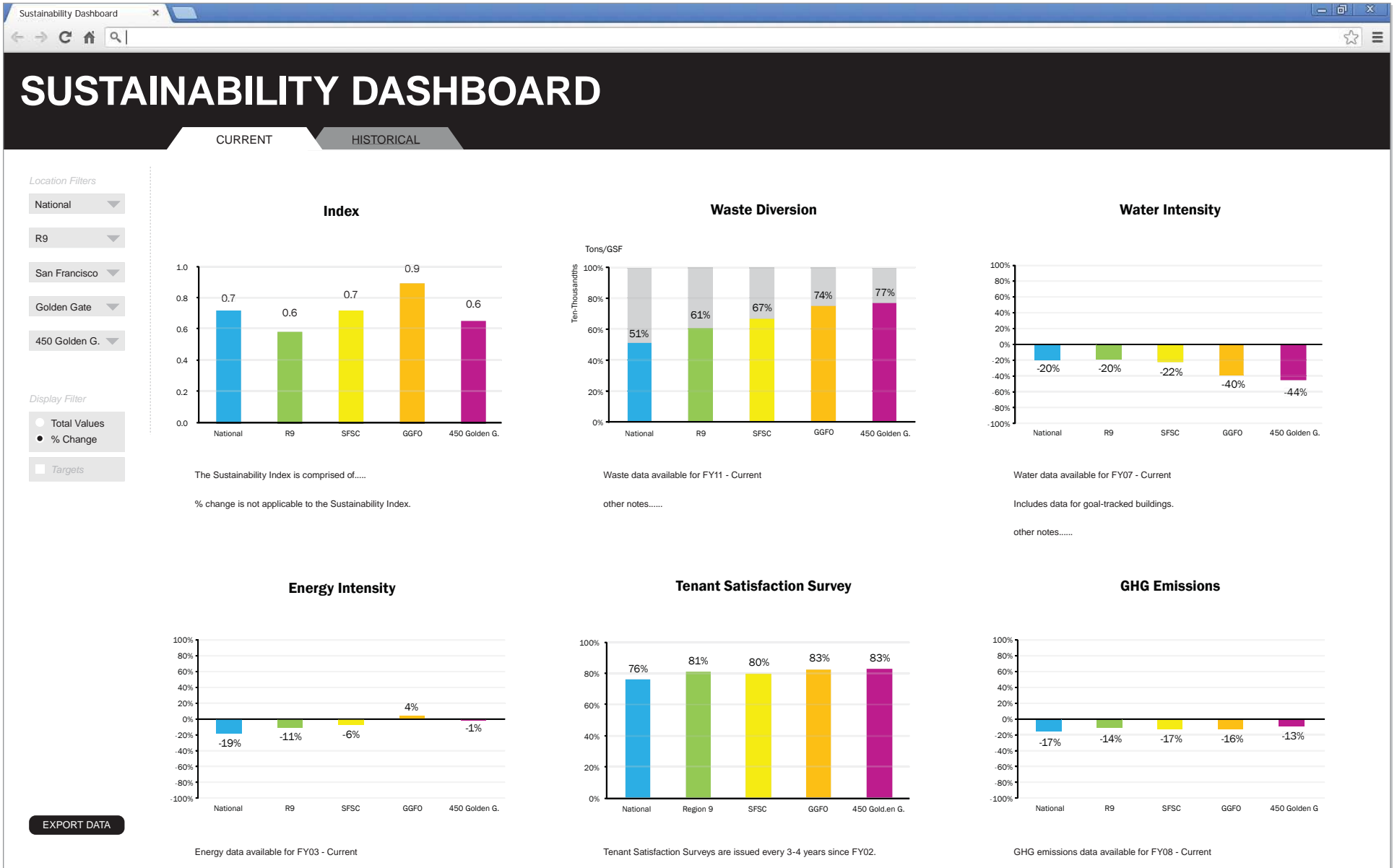
To reflect the full picture of sustainability at GSA the dashboard will also incorporate data on our customer's fleet and the supply chain.

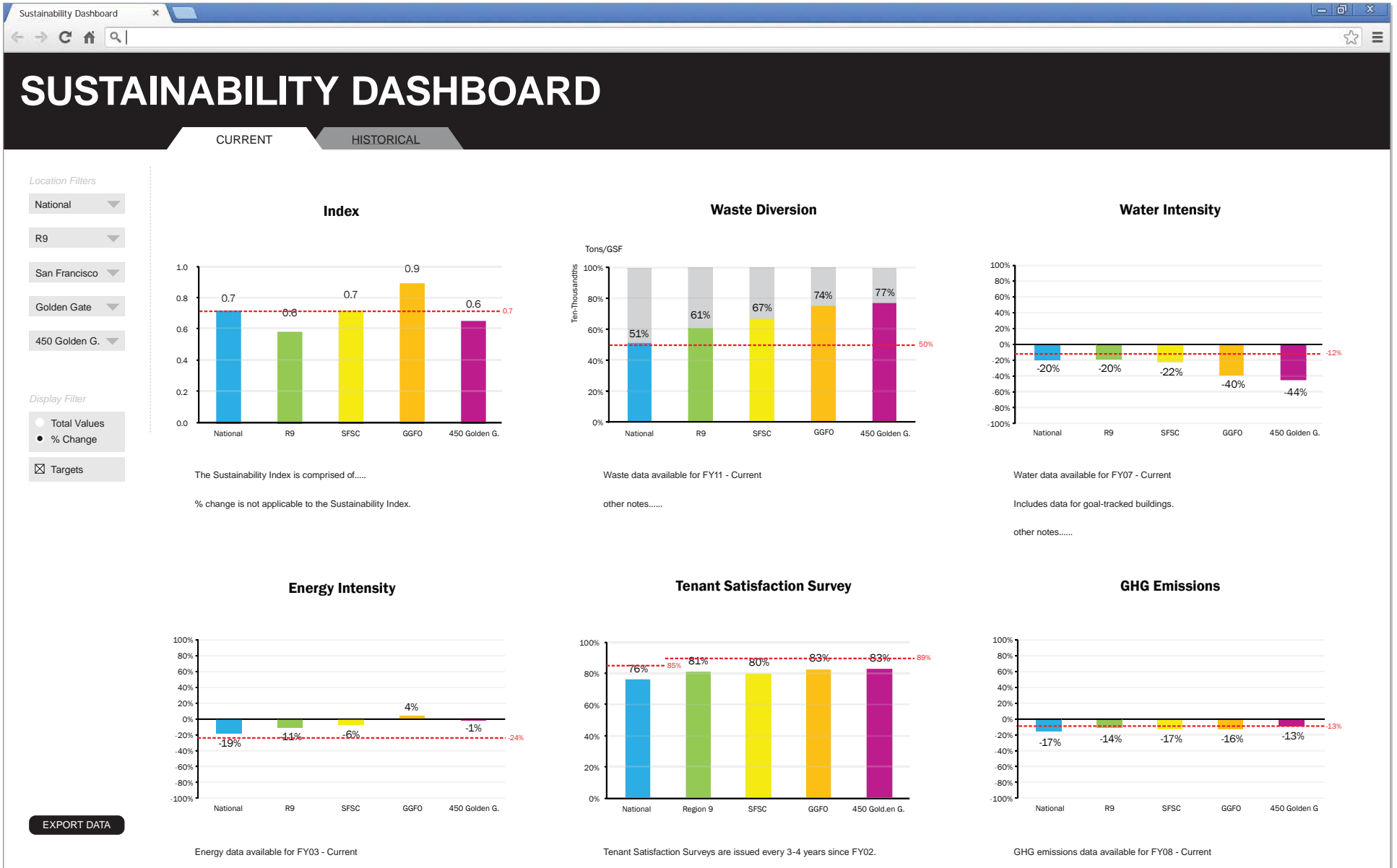


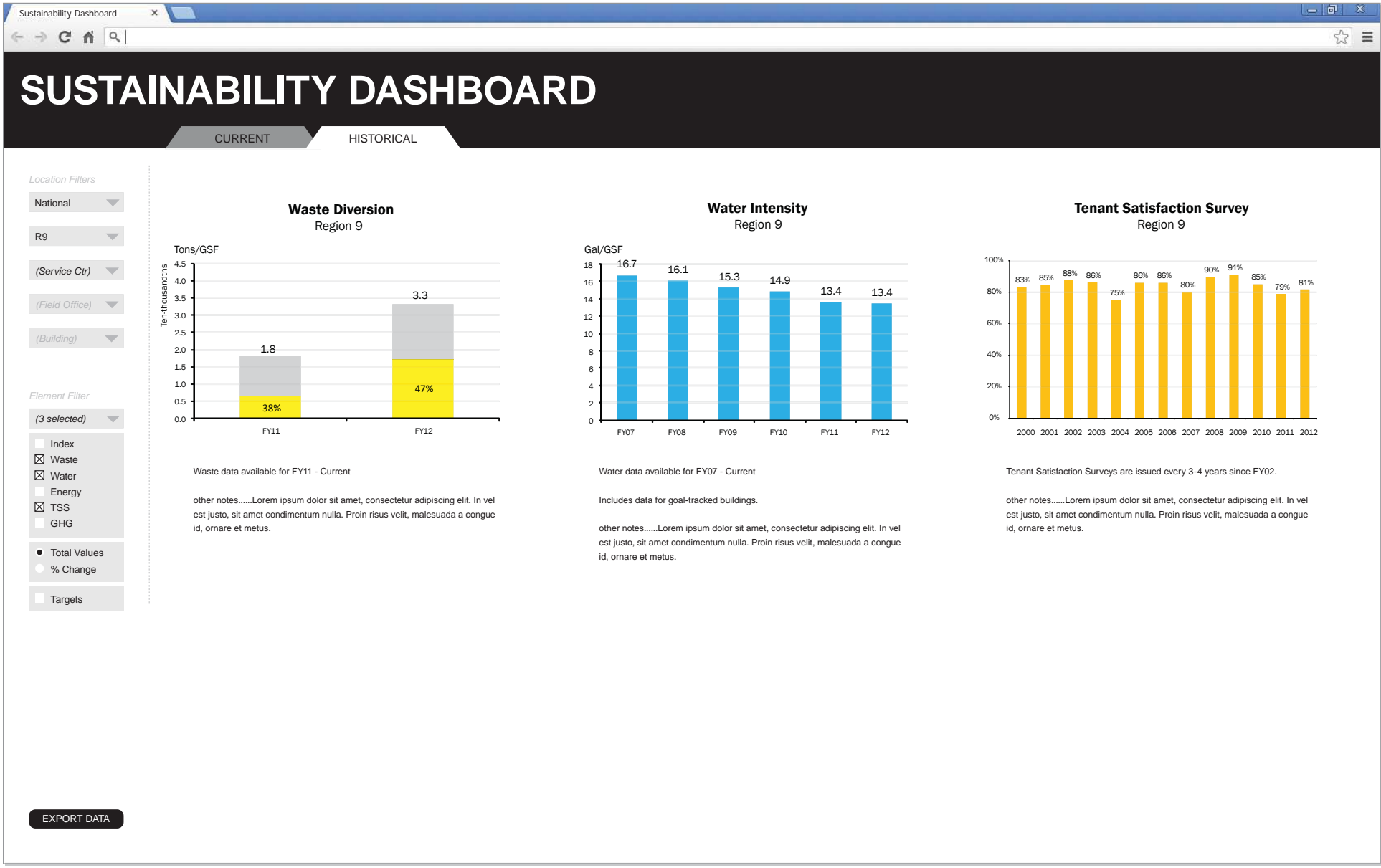


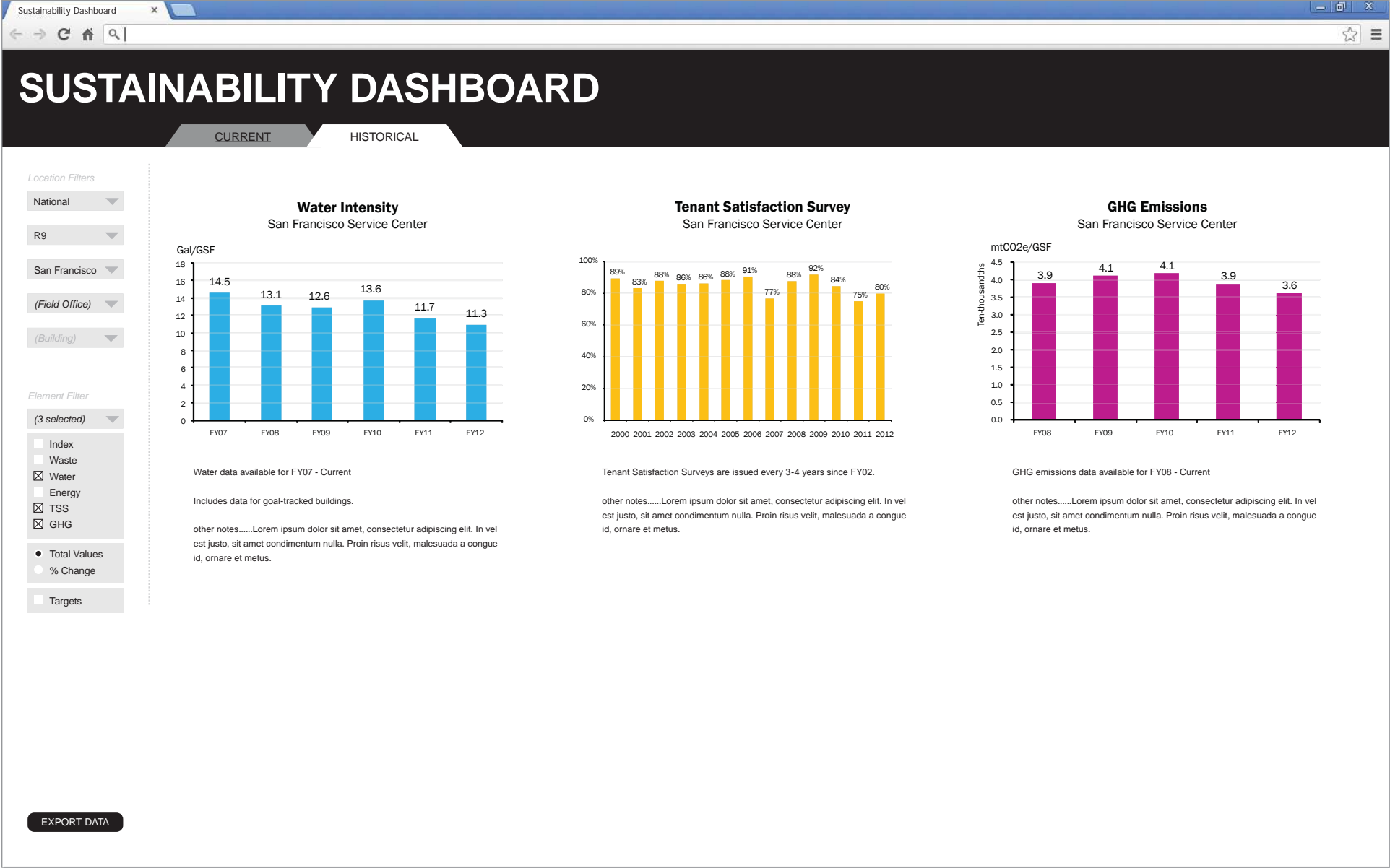


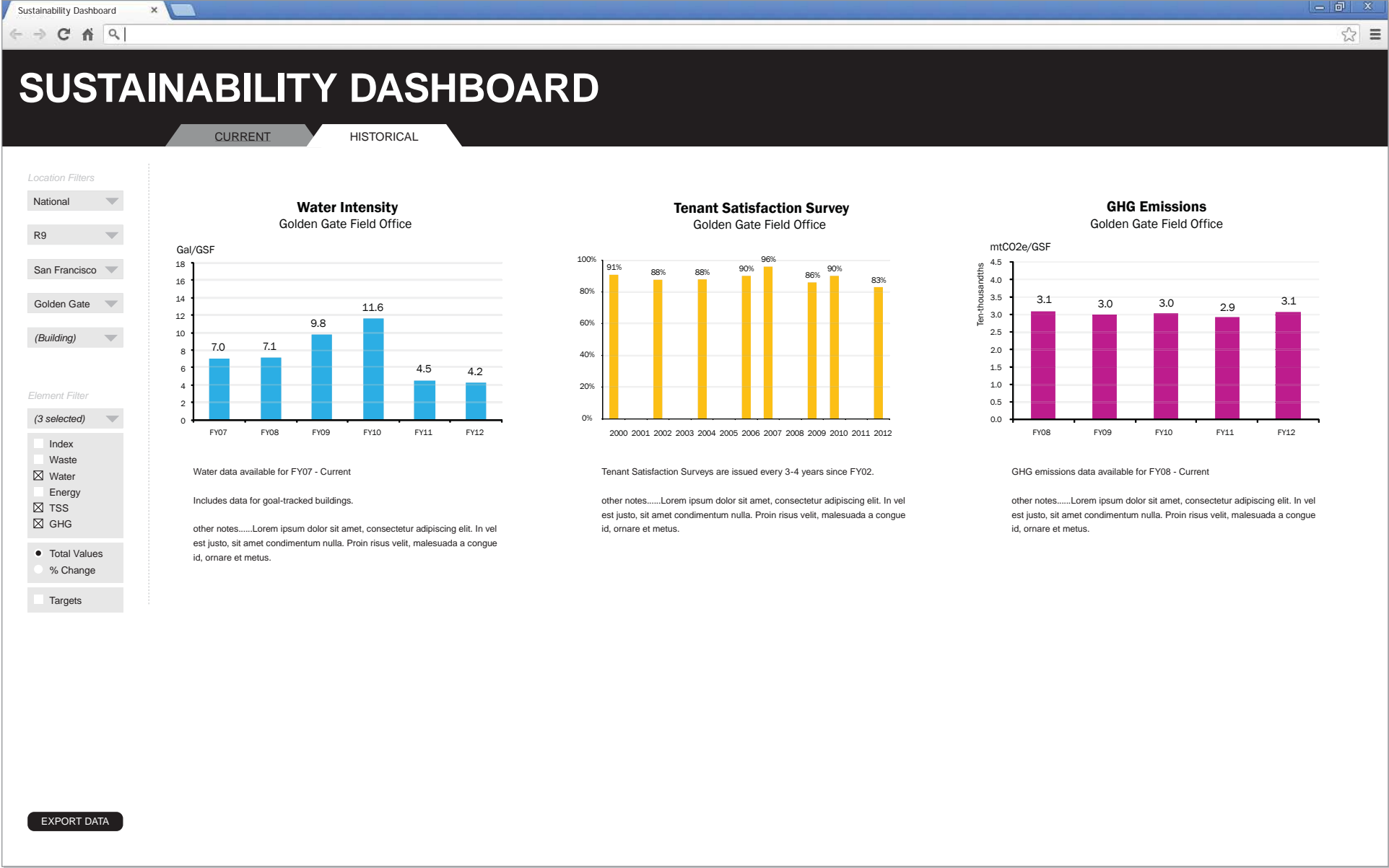


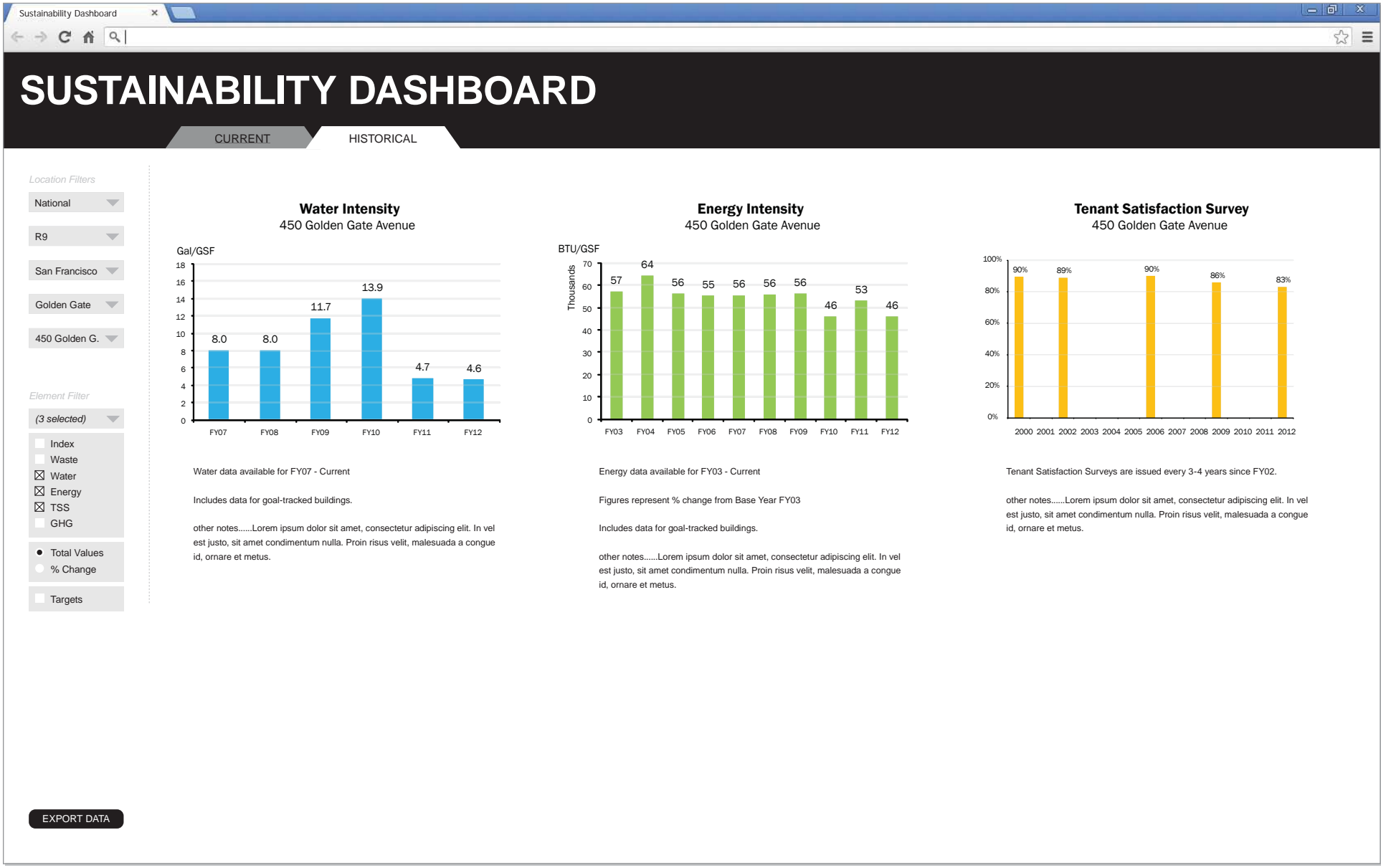


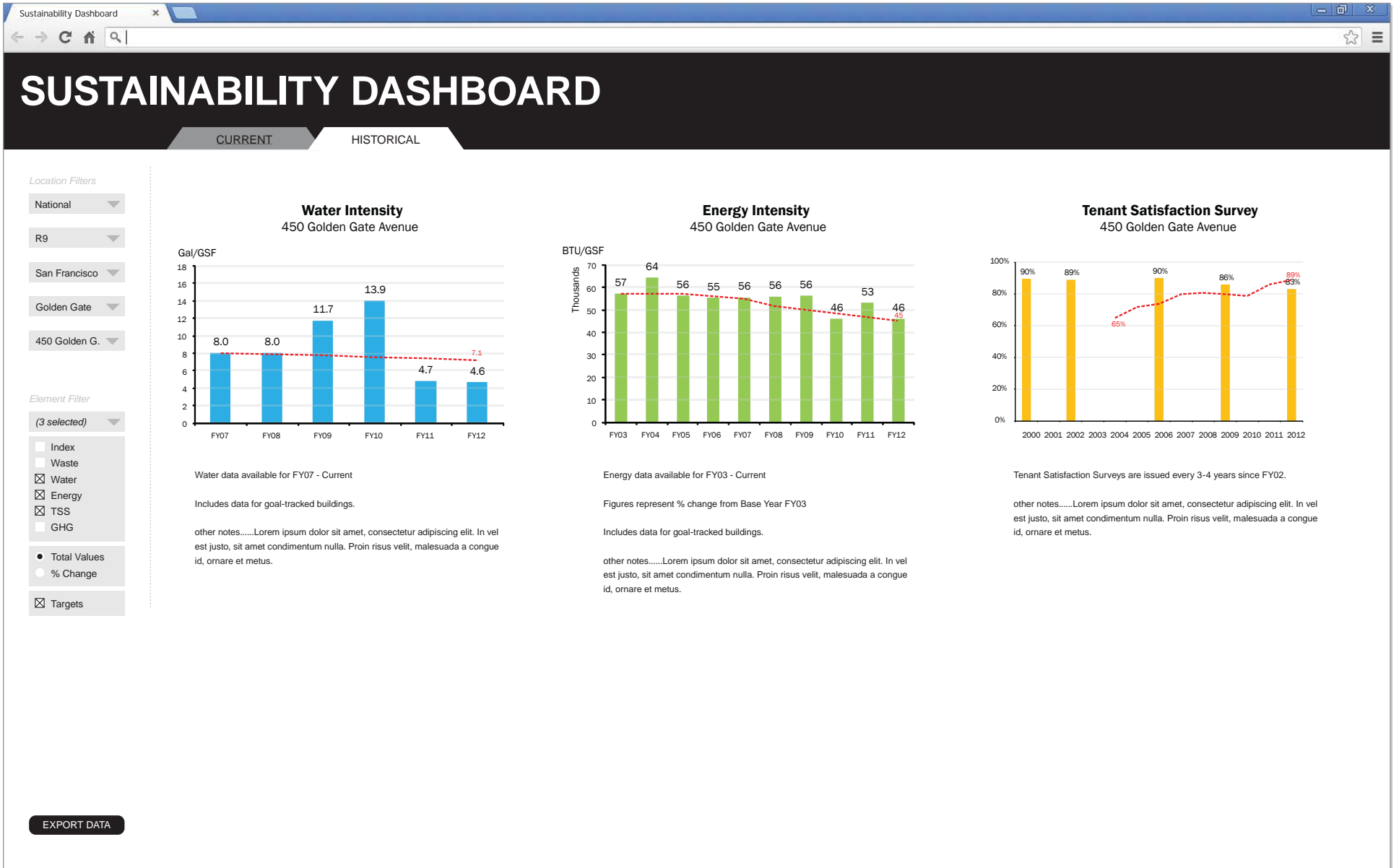






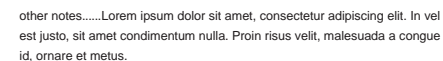
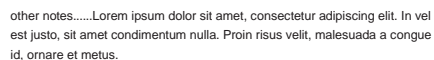
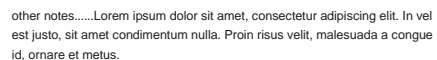






HISTORICAL

Targets



EXPORT DATA

Sustainability Dashboard

SUSTAINABILITY DASHBOARD

CURRENT

HISTORICAL

Location Filters

National

R9

San Francisco

Golden Gate

450 Golden G.

Element Filter

(3 selected)

☐ Index

☐ Waste

☒ Water

☒ Energy

☒ TSS

☐ GHG

☐ Total Values

☒ % Change

☒ Targets

Water Intensity

450 Golden Gate Avenue

Fiscal Year	% Change
FY07	0%
FY08	1%
FY09	47%
FY10	75%
FY11	-40%
FY12	-42%

Water data available for FY07 - Current

Figures represent % change from Base Year FY07

Includes data for goal-tracked buildings.

other notes.....Lorem ipsum dolor sit amet, consectetur adipiscing elit. In vel est justo, sit amet condimentum nulla. Proin risus velit, malesuada a congue id, ornare et metus.

Energy Intensity

450 Golden Gate Avenue

Fiscal Year	% Change
FY03	0%
FY04	12%
FY05	-2%
FY06	-3%
FY07	-3%
FY08	-2%
FY09	-20%
FY10	-7%
FY11	-20%
FY12	-21%

Energy data available for FY03 - Current

Figures represent % change from Base Year FY03

Includes data for goal-tracked buildings.

other notes.....Lorem ipsum dolor sit amet, consectetur adipiscing elit. In vel est justo, sit amet condimentum nulla. Proin risus velit, malesuada a congue id, ornare et metus.

Tenant Satisfaction Survey

450 Golden Gate Avenue

Fiscal Year	% Change
FY02	90%
FY03	89%
FY04	90%
FY05	86%
FY06	85%
FY07	89%
FY08	85%
FY09	89%
FY10	85%
FY11	89%
FY12	85%

Tenant Satisfaction Surveys are issued every 3-4 years since FY02.

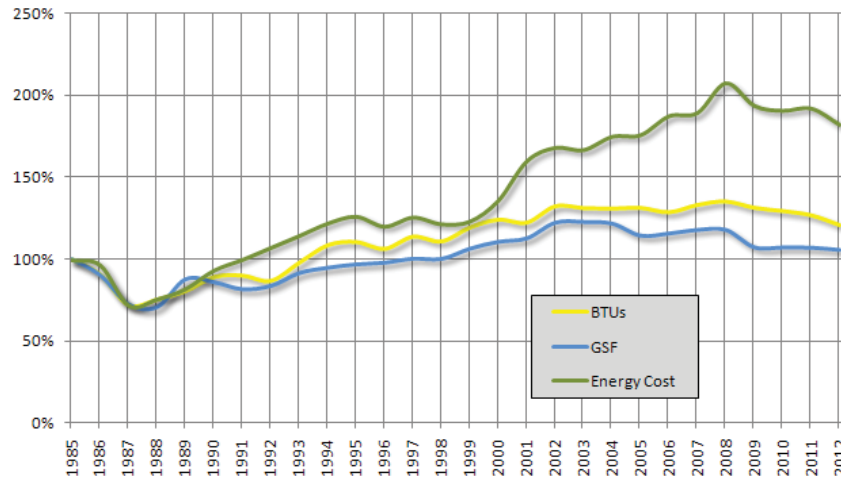
% change from Base Year is not applicable to TSS.

other notes.....Lorem ipsum dolor sit amet, consectetur adipiscing elit. In vel est justo, sit amet condimentum nulla. Proin risus velit, malesuada a congue id, ornare et metus.

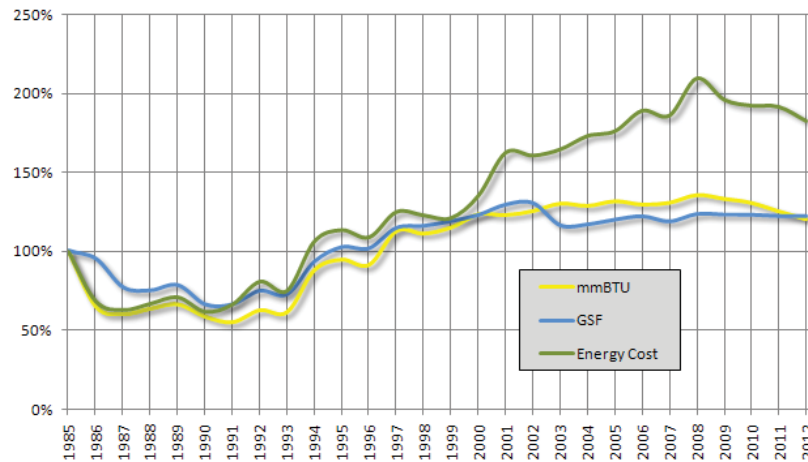
EXPORT DATA

APPENDIX B

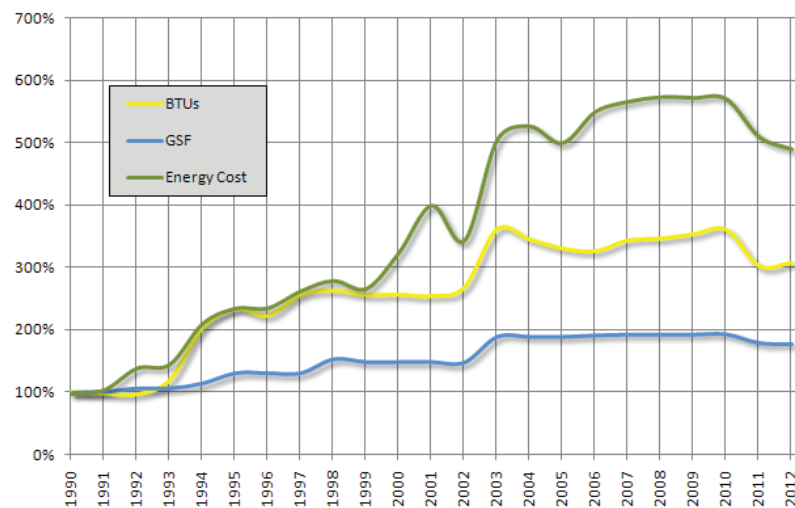
All EUAS Buildings Energy Trend Analysis



Goal Tracked (A, C, & I) Energy Trend Analysis



Energy Intensive (I) Category Trend Analysis

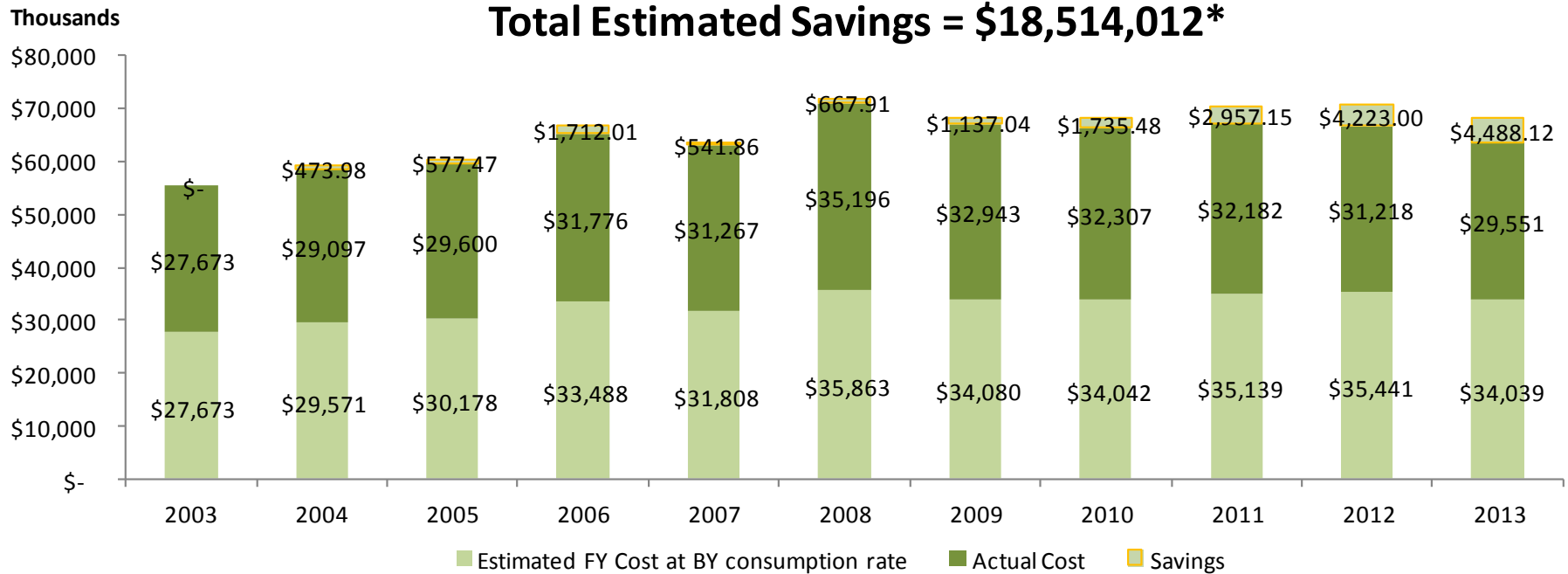


All data was normalized to show a trend with actual GSF & Annual Energy Cost over time.

APPENDIX C

Actual Cost vs. Projected Cost at BY Consumption Rate

Total Estimated Savings = \$18,514,012*

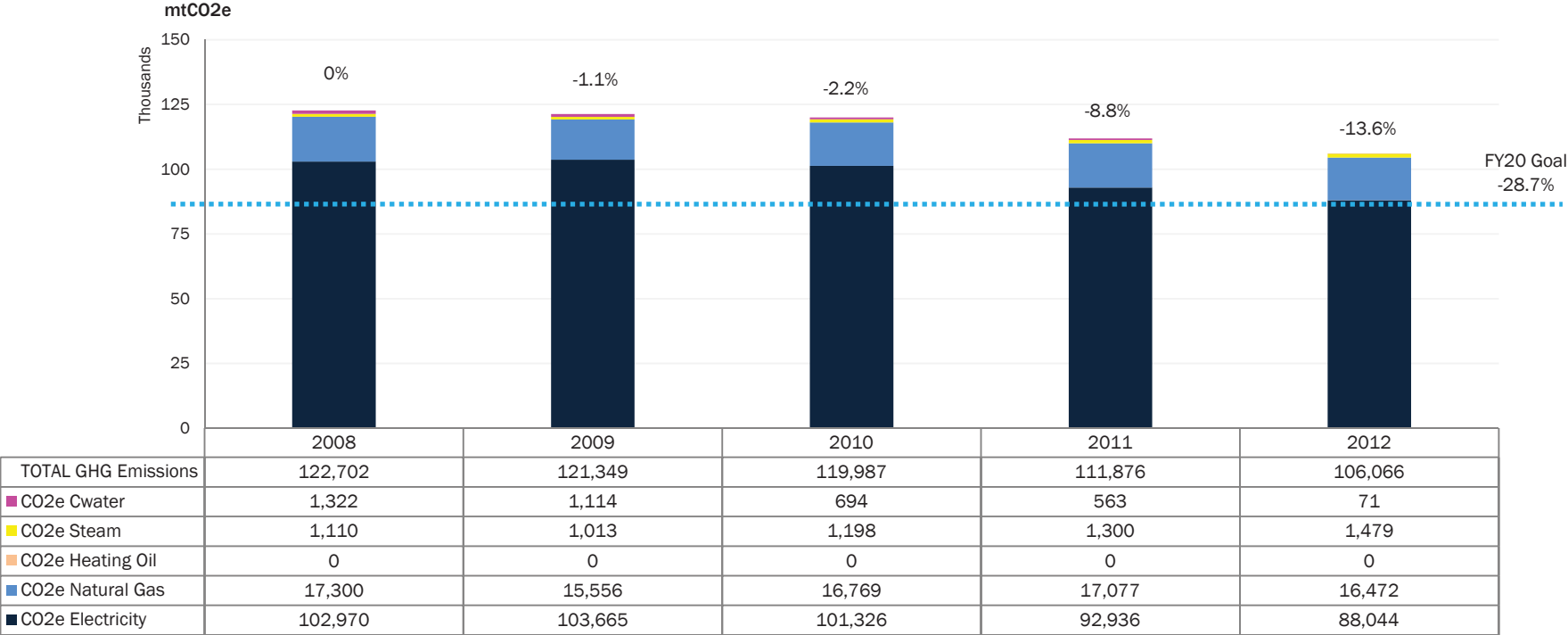


This analysis compares the total actual cost with the cost we would have paid had we consumed energy at the FY 2003 (BY) 's rate.

* Data was based on goal tracked buildings. FY13 data was based on March floating 12-month.

APPENDIX D

Region 9 - Green House Gas Emissions



APPENDIX E

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 1: DIRECT SOURCE GHG REDUCTION

■ By **FY2020**, reduce direct source GHG emissions **28.7%** below **FY2008** baseline

how?

Part 1: Direct Source GHG Reduction in FEDERAL BUILDINGS

■ By **FY2020**, reduce facility energy intensity in GSA-owned Federal Buildings **37.5%** below **FY2003** baseline

From **FY2016 - FY2020**, reduce facility energy intensity in GSA-owned Federal Buildings **1.5%** annually

Design new buildings and major renovations to exceed industry standards for energy efficiency

- Minimum 30% below ASHRAE standard 90.1
- Minimum LEED Gold
- Performance no less efficient than the average BTU/GSF for geographically comparable facilities

Invest in limited-scope projects to improve energy efficiency based on:

- Life-cycle cost efficiency
- Financial return on investment
- Estimated energy savings per dollar investment
- Anticipated reductions to GHG emissions

Conducting Energy and Water Evaluations

- EISA section 432
- Retro-commissioning once every four years

Installation of advanced electricity meters in all covered buildings and ARRA projects by **FY2012**

- Expand advanced metering program to measure natural gas and steam by **FY2016**.

■ By **FY2020**, increase renewable energy production and procurement to **30%** of annual energy consumption

- By **FY2013**, increase renewable energy production and procurement to **15%** of annual energy consumption
- Renewable energy requirements required in electricity purchase contracts
- Expanding inventory of on-site energy generation projects

■ Increase density in Federal buildings and dispose of excess or underutilized buildings

- Consolidate space
- Improve space utilization
- Increase telework participation
- Workplace design solutions
- Disposal of excess or underutilized buildings

■ Expand energy and sustainability training for facilities managers to adopt a curriculum-based approach

- Federal Infrastructure Fundamentals Training

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 1: DIRECT SOURCE GHG REDUCTION

■ By **FY2020**, reduce direct source GHG emissions **28.7%** below **FY2008** baseline

how? Part 2: Direct Source GHG Reduction in GSA INTERNAL FLEET

■ By **FY2020**, reduce GHG emissions from GSA motor vehicles **3%** below **FY2008** baseline

■ Minimum annual review of fleet size and capacity

Vehicle Allocation Methodology (VAM)

- Requires consideration of transportation alternatives
- Sub-compact sedan base for fleet
- Procurement of low GHG vehicles
- Mandates use of alternative fuel when available

Transition current fleet to optimized vehicle allocation and increase fleet fuel efficiency

- Turn in motor vehicles in excess of needs
- Exchange for smaller vehicles where effective
- Hybrid-electric and plug-in electric vehicles where effective

Standard vehicle acquisition guidance to procure senior executive vehicles

■ Implement a long-term strategy for reducing petroleum consumption and increasing alternative fuel usage

- By **FY2015**, increase consumption of alternative fuels **159%** above **FY2005** baseline
- By **FY2015**, reduce consumption of gasoline and diesel fuel **30%** below **FY2003** baseline

■ By **FY2015**, improve efficiency of shuttle bus operations to consolidate into a single office

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 2: INDIRECT SOURCE GHG REDUCTION

■ By **FY2020**, reduce indirect source GHG emissions **14.6%** below **FY2008** baseline

how? Part 1: Reduce emissions from EMPLOYEE TRAVEL

- By **FY2012**, reduce emissions from employee travel by **25%** below **2008** levels
- By **FY2012**, increase telework and alternative workplace participation rate to **60%**
- Modify travel policies and invest in new technology to reduce employee business travel

how? Part 2: Reduce GHG Emissions from SOLID WASTE DISPOSAL and WASTEWATER TREATMENT

- By **FY2015**, reduce GHG emissions from contracted solid waste disposal **50%** below **FY2008** baseline
 - Increase diversion of solid waste
- By **FY2020**, reduce GHG emissions from contracted wastewater treatment **5%** below **FY2008** baseline
 - Improve water efficiency of buildings

how? Part 3: Reduce Indirect GHG Emissions from TRANSMISSION AND DISTRIBUTION Losses

- By **FY2020**, reduce GHG emissions from T&D losses of purchased energy **10%** below **FY2008** baseline
 - Reduce energy consumption
 - Increase on-site power generation

how? Part 4: Develop and Maintain Agency Comprehensive GREENHOUSE GAS INVENTORY

- Complete **FY2011** GHG Inventory and update **FY2008** baseline if necessary by Jan **2012**
 - Work with OMB, CEQ, and DOE Federal Energy Management Program (FEMP) to strengthen GHG emissions estimation methodologies
 - Include GHG emissions and reductions targets in budget formulation process
 - Integrate GHG emissions data into agency performance management process by **FY2015**

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 3: SUSTAINABLE DESIGN, GREEN BUILDINGS, LOCAL PLANNING

■ Address sustainability and increase effectiveness of regional and local planning

how? Part 1: High Performance Sustainable Design and Green Buildings

■ By **FY2015**, **18%** of GSA-owned Federal buildings and leases greater than 5,000 GSF will incorporate practices from *Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings*

- Employ Integrated Design Principles
- Optimize Energy Performance
- Protect and Conserve Water
- Enhance Indoor Environmental Quality
- Reduce the Environmental Impact of Building Materials

■ Design buildings to achieve net-zero energy according to E.O. 13514 by **FY2030**

■ By **Dec2011**, assess **7%** of owned buildings and leases for compliance with *Guiding Principles*

■ Incorporate sustainable practices into agency policy

- *Guiding Principles in the Facilities Standards for the Public Buildings Service* (P100) design standards in design and in operations and maintenance contracts
- By **FY2011** develop performance specifications for green interior finishes
- By **FY2011** use LEED Existing Building Operations and Maintenance standards
- By **FY2012** all eligible federal buildings will have an accurate Energy Star rating
- All new leases must be awarded in Energy Star buildings
- By **FY2011** assess sustainable provisions within standard lease specifications, including optional clauses
- By **FY2011** select no less than 12 cost-effective, innovative green building strategies to demonstrate in GSA federal buildings through the Green Proving Ground program

■ By **FY2011** continue to dispose of excess real property

- Strategic portfolio plans for three customer federal agencies to consolidate space, increase space utilization, promote telework
- *Space Utilization Guidance and Recommendations* to help agencies make sustainable space acquisition and management decisions

■ By **Dec2011**: assess viable green buildings certification systems to determine the most appropriate for Federal use

■ By **FY2011** deploy new tools to engage building occupants in collaborate efforts to improve energy and water conservation, waste reduction and indoor air quality in federal buildings

■ Continue to conserve, rehabilitate, and reuse historic Federal buildings to ensure that they are contributing to high performance green building goals.

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 3: SUSTAINABLE DESIGN, GREEN BUILDINGS, LOCAL PLANNING

■ Address sustainability and increase effectiveness of regional and local planning

how? Part 2: Regional and Local Planning

■ By **July 2011**, complete transportation and long-range planning outreach pilots in **11** MPOs

■ By **June 2012**, complete transportation and long-range planning outreach pilots in additional **10** MPOs

- Engage local planning officials in informal information sharing to build sound working relationships and id issues of mutual interest
- Develop a list of metro areas and coordinate initial meetings with MPOs by the end of FY11.

■ By **July 2011**, issue revised policies and guidelines for planning new federal facilities and leases to incorporate sustainable building location criteria

- By **July 2011** issue a new Site Selection and Acquisition Reference Guide and update lease procurement policies and standards in the Leasing Desk Guide to integrate sustainable location considerations
- In **FY 2011** complete draft update to government-wide location policy on the Federal Management Regulations

■ By **June 2012**, develop quantitative measures for comparing the sustainability of alternative locations, and use this comparative methods in **4** lease transactions and **2** federal site selections

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 4: WATER USE EFFICIENCY AND MANAGEMENT

■ By **FY2020**, reduce potable water use intensity **26%** below **FY2007** baseline

■ By **FY2020**, reduce industrial, landscaping, and agricultural water use **20%** below **FY2010** baseline

how? Implementation Methods:

■ From **FY2008 - FY2020**, reduce potable water intensity in GSA-owned Federal Buildings **2%** annually

■ Implement water management best practices

- Update routine maintenance procedures to include testing water systems and fixtures for optimal performance
- Optimize irrigation equipment, scheduling, and plant health selection based on existing landscape and respective climate.
- Audit facilities with single-pass cooling systems and retrofit equipment to a closed-loop system and reuses potable water

■ Dedicate funding to water conservation projects

■ Increase EISA Energy and Water Evaluations, deploy advanced water meters, integrate water metering data into agency decision-making

- Conduct water retro-commissioning as required by EISA section 432
- Advanced water meters in all ARRA projects by **FY2012**
- Integrate energy and water evaluations and advanced meter data into agency decision-making processes

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 5: POLLUTION PREVENTION AND WASTE REDUCTION

■ By **FY2015**, divert **50%** of non-hazardous solid waste from landfills

how? Implementation Methods:

■ Assess waste management practices to id viable opportunities for increasing diversion of solid waste, construction & demolition debris, and compostable organic waste

- Waste Audits

■ By **July2011**, complete pilot projects to promote recycling in **48** GSA-owned federal buildings

■ Minimize generation of pollutants through source reduction of hazardous chemicals and materials

- Increasing alternative chemicals and processes
- Decreasing agency use of GHG-emitting chemicals

■ Reduce printing paper use and increase use of uncoated paper containing minimum **30%** postconsumer fiber

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 6: SUSTAINABLE ACQUISITION

- **95%** of new contract actions will require the supply or use of environmentally-preferable products and services

how? Implementation Methods:

- Prioritization of energy efficient, water efficient, bio-based, non-ozone depleting, recycled content, non-toxic/less toxic alternatives
- By **FY2011**, GSA will deploy mandatory green purchasing awareness training for all employees
- By **FY2011**, GSA will track sustainable acquisition compliance at the point of award and develop processes for regular review and analysis of sustainable acquisition data
- By **Jan2012**, GSA will update affirmative purchasing plan to reflect lessons learned, new requirements, and new sustainable products and services
 - Green Purchasing Plan issued in **Jan2011**
- Use sustainable acquisition principles, including source reduction, to reduce pollution and hazardous materials, minimize waste generation, and reduce GHG emissions

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 7: ELECTRONIC STEWARDSHIP AND DATA CENTERS

- By **FY2015**, consolidate **15** regional data centers into **3**
- Ensure **100%** compliance with EnergyStar, EPEAT-registration, and sound disposition practices for all GSA laptops, desktops, monitors, and electronic product acquisitions

how? Implementation Methods:

- By **FY2015**, eliminate field location server closets through virtualization and centralization
- Reduce power consumption and GHG emissions at data centers
 - Install advanced energy meters in **100%** of agency-operated data centers
 - Use advanced energy meter data to identify and implement energy-efficient improvements in power and cooling.
 - By **FY2015**, every GSA-operated data center will be minimum **40%** virtualized
 - Replace servers and other IT assets with more energy-efficient models to achieve minimum Power Utilization Efficiency ratio of **1.8** at all data centers
- Consolidation policies to share printers
- Sustainable practices to manage IT consumables
- Environmental sound disposition of excess or surplus electronic products, tracks disposals to ensure **100%** proper disposal

GSA NATIONAL STRATEGIC SUSTAINABILITY PERFORMANCE PLAN

GOAL 8: AGENCY INNOVATION & GOVERNMENT-WIDE SUPPORT

■ Encourage innovation and participation from vendors, contractors, and all Federal agencies

how?

Part 1: Agency Innovation: Vendor and Contractor GHG Emissions

- By **FY2011**, help **72** small business complete their first GHG inventories with the EPA
- By **FY2012**, develop strategy to encourage federal contractors to inventory and disclose their GHG emissions data
- Develop collaborative forum for government, industry, and academia to address issues in greening the supply chain.

how?

Part 2: Government-Wide Support

- Expand green-only Multiple Award Schedule offerings to provide other agencies with quick and easy access to sustainable products and services
- Continue to improve GSA Advantage! to align with sustainable purchasing requirements
- Update Product and Service Codes (PSC) manual for government-wide contract reporting to include new codes for sustainable products
- Implement national strategy for electronics stewardship develop by the interagency task force on electronics stewardship
- Enhance and expand federal agency use of the GSA Carbon Footprint Tool

APPENDIX F

R9 Sustainability Plan Draft Triple Bottom Line (TBL)

“Less is more.” . . . Ludwig Mies van der Rohe

Objective:

- Make a business case approach which uses disciplined, documented triple-bottom line analysis for all business decisions the R9 business-as-usual practice.

For the purpose of this plan, triple bottom line is used to describe a methodology that optimizes business decisions by determining the highest investment value through an analysis of the life-cycle cost and benefits of the environmental impacts and social impacts and benefits as well as the resource investment. That is, each investment and activity is analyzed uniformly to assure that it provides the greatest social and environmental benefit while providing the US taxpayer the best value over its life-cycle. It is the objective of this plan that R9 will evolve to a steady-state wherein in all decisions at all levels quantitatively and uniformly balance and optimize economic, environmental and social impact based on specific, measurable data. It will be R’s standard operating procedure that, when determining the value to the American taxpayer, to consider the cost of any degradation or regeneration of our society or the natural environment.

Current Situation: Efforts are made to optimize investments and to consider life-cycle costs as well as environmental impacts. Social impacts are also considered. However, analysis is not consistent across the organization due to many factors including inconsistent policies and procedures, variations in individual skills and competencies, inconsistent measurements and metrics and competing priorities. Although R9 strives to use effective business case based decision making, there is opportunity for more precise practices as well as more diligent verification that we do so. There will be untold benefit in consistently looking at our performance from a three-dimensional perspective and becoming more mindful and diligent about our impacts on the value of taxpayer investment as well as the impact of our business decisions on people and the planet.

Strategies:

- Establish a Triple Bottom Line Task Force to develop a methodology and implementation plan.
 - **Measurements:** Because there are no universally accepted standards for the three TBL categories, we must adopt our own and diligently tune them to assure we achieve desired results. Success will be measured based on meeting the following objectives: 1) Team to be formed immediately by end of calendar year 2012; 2) team is to complete the development of the methodology and tools by the end of FY 2013; 3) to complete the roll-out and training by the end of FY 2014 and 4) achieve TBL as business as usual by FY 2015.

- **Implementation Plan.** Attract a “diagonal slice” team that cuts across the organization that has the skills and competencies required to develop a method and implementation plan for quickly migrating the organization to a TBL approach. Key to success will be the development of metrics and methodology (See Measurement in section below.) It is envisioned that the team will develop a very simple but effective tool that makes it quick and easy to apply a TBL analysis to all business decisions, large and small. For success, the team must represent all aspects of GSA’s business, yet function as a team of peers.
- Establish a baseline that documents a uniform, user-friendly TBL business case approach which balances and optimizes the economic, environmental and social costs and benefits to be used for all business decisions.
 - **Measurements:** 1) Development of TBL business case methodology that balances dollars spent with taxpayer value, life-cycle costs and benefits of social and environmental impacts. NOTE! Evaluation criteria can be weighted and may be specific to importance of impact of investment. For example, impacts can be categorized as to whether they impact: a) an individual, b) an area, say a city; c) a region or d) global. They can also be categorized as to their life-cycle. For example: a) temporary; b) short term; c) long-term; d) for ever. The level of analysis for an a/a may be less stringent than for a 4/4. As an example, the level of triple bottom line analysis for a temporary swing space for a small group may be less rigorous than for the new Los Angeles Courthouse. 2) Train key decision makers on TBL methodology. 3) Apply TBL business case analysis to all business decisions.
 - **Implementation Plan:** Establish baseline, develop methodology and set targets before FY14. Train key personnel before FY15; TBL business case analysis for all business decisions by FY16.

General barriers to success and tactics to overcome them:

- **Complexity.** There is no consistent methodology for measuring the social and economic impacts. Although this could be a barrier, we have the opportunity to establish criteria specific to our business and to continue to refine the targets and metrics.
- **Policies, procedures and tools.** Because this we do not have a developed TBL approach, we must develop and implement the approach. We will create a TBL Task Force to develop the strategies and tactics to overcome this and other barriers.
- **Baseline data.** Much of the baseline data, especially in the environmental and social categories, will need to be developed. We will need to gather the baseline data as targets are identified.
- **Inertia** or resistance to change is always a barrier. The development of momentum is often an effect tactic for overcoming this barrier. See culture change.
- **Underdeveloped expertise.** Because triple bottom line analysis is fairly new and fairly advance, it generally requires advanced skills and competencies. Education is the best strategy for overcoming this barrier. See cultural change.

Success Measurement:

- Based on the baseline established in FY 2014, establish an annual score card to measure and record achievement. Each year track progress, reassess effectiveness, correct the approach as required to capture opportunities for improvement, true-up data, report results, share lessons learned, celebrate success. Plan success will be the extent to which all of this is done and results in measurable reduction of GSA's environmental footprint concurrent with measurably enhanced social responsibility and documented added value for funds invested.

NOTES/CONSIDERATIONS**Financial**

Return on investment
Funds from operations
Internal rate of return
Profit
Taxpayer value
Cash flow
Leveraging resources
Depreciation
Market value

Social

Unemployment reduction
Jobs creation
Skills development
Health impacts, enhance or degrade
Veterans
Disabled veterans
Disadvantaged
Poor
Small business
CBD
Transit

Environmental

Impact on natural resources, influences to its viability
Air and water quality
Energy use
Natural resources degradation or regeneration
Solid and toxic waste creation

Land use/land degradation or regeneration

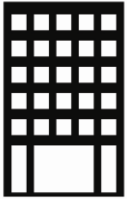
Specifics such as:

- Sulfur dioxide concentration
- Concentration of nitrogen oxides
- Selected priority pollutants
- Excessive nutrients
- Electricity use Fossil fuel consumption
- Solid waste management
- Hazardous waste management
- Change in land use/land cover

APPENDIX G

The Building Assessment Task Force: *Process Outline*

As of May 9th, 2013



BUILDINGS

Mission:

The Building Assessment Task Force was created to analyze the portfolio from a holistic perspective to include; financial, technical, and geographic considerations. Initially they will focus on determining the possibilities for the most potentially impactful energy and water projects. Eventually the multi-disciplinary team will evolve into the reviewing body for all building projects which have an impact on the consistency and integration of all building projects (see figure #1) and with the focus of tying projects to our sustainability goals as outlined in the Region 9 Sustainability Plan.



Figure 1 - Integrated Process - Review of all Aspects

Team Make Up:

Membership is dynamic within the various divisions. For efficiency we divided the team up into “**Core**” and “**Specialty**” team members. The core team performs the in depth level of review and determines the preliminary “fit” of a particular strategy or project with the building up for review. The specialty team members are brought in at key points to leverage their expertise and buy in.

Core :

- Field Offices
- Service Centers
- Energy and Sustainability Branch
- Portfolio
- Design and Construction
- Technical (O&M and FLS)

Specialty :

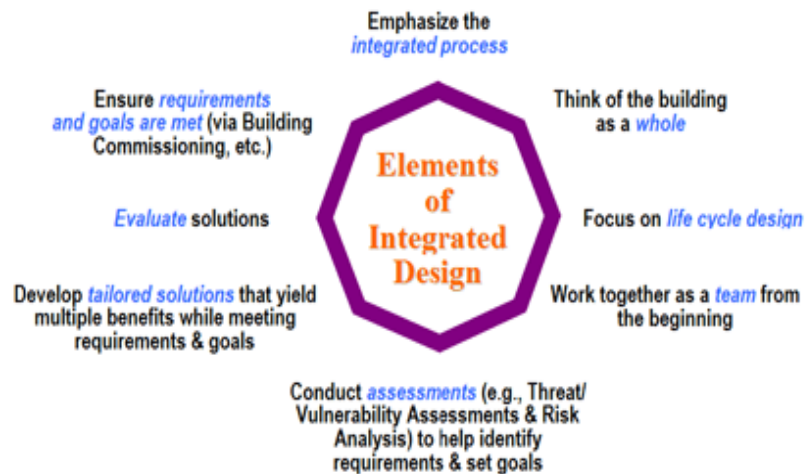
- Finance
- Contracting
- Client Solutions
- Any party wishing to submit to be a part

Two Review Core Elements:

1. Looking at the building as a whole system
2. Bringing all stakeholders into the decision-making

Objectives:

- ✓ Engage all buildings (building-by-building) using the integrated approach
- ✓ Eliminate Patchwork treatment and disjointed spaces
- ✓ Provide multiplicative benefits
- ✓ Increase opportunity to plan finds avoidable costs



Important Factors for Consideration for the Task Force:

- Consistently evolving in three key ways:
 - people serving on the task force
 - projects/approach to be perfected with experience
 - review to be performed on-going - each Building Reviewed at least every 2 years
- Comprehensive review Building by Building
- Task force is recommending Body to Senior Leadership and the Portfolio review process

Goals:

- Develop a comprehensive, integrated plan for each building (decrease patchwork planning and treatment)
- Utilize Integrated Decision Making
- Determine impacts by relatively low-cost means (parametric estimates where possible)
- Understand the unique dynamics of each building
- Eliminate silo'ed decision-making
- Develop database to house results and provide reporting
- Supply Senior Leadership and the Portfolio review process the most empirical review and recommendations possible and make
- Make sustainability in projects (and our buildings) an inextricable part of our considerations.
- Work with Alternative Financing MDT to identify possible funding sources need to be identified and recommended
- Expand reach to review improve the consistency and integration of all building projects
- Share findings with Workplace Transformation and other related efforts.
- Align with GPG vetted strategies and technologies
- Open placeholder within the review for innovation in design

Process:

Although currently evolving, here are the steps we have in place now:

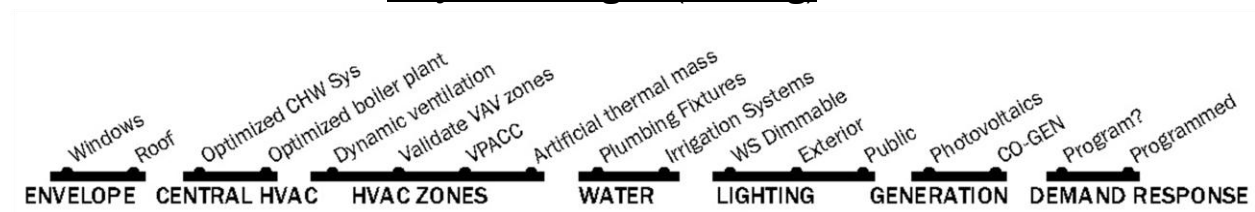
1. Stage I - Select the set of buildings for review. Select team and develop draft MDT/Task Force outline document.
2. Stage I - Develop materials that will best inform the task force
 - a. Current State of the Portfolio (a.k.a the Dot Diagram)
 - b. Existing Energy Studies and RCx reports
 - c. Targeted building surveys
 - d. Energy and water usage reports and graphs
 - e. Location on the climate zone map
 - f. Asset Business Plan, WebBER, and PCS reports

- g. Past information available for project types performance (i.e. what is known about ARRA project performance)
 - h. Future scheduled projects
3. Stage II, First Meeting - Look at the high level factors for “**Supporting Tools**” and “**Project Strategies**” and the potential for each. (Note: at this stage we are somewhat generous with giving a strategy or project a “go” as we are just in the exploratory stage). Review and ratify MDT outline.

Supporting Tools:



Project Strategies (starting):



4. Stage II, First Meeting - Put the list forward to determine if a parametric estimate will work or if a further, more vetted study is required
5. Stage III - Bring the various studies and estimates back to the Task Force for a “go” or “No go” decision.
6. Stage III - As part of the “go” decision making, the task force will determine if it is “Type 1” or “Type 2”. Type 1 projects automatically move forward to recommendation based on their readiness for funding. Type 2 projects are set through the Project Criteria determination phase (see the separate description provided)
7. Stage III and On-going - If go, the task force then determines recommendations for best time frame to move forward and how the project will be financed and agrees as a group to recommend or not to Senior Leadership and Portfolio.
8. Stage III and On-going - Publish final recommended list.

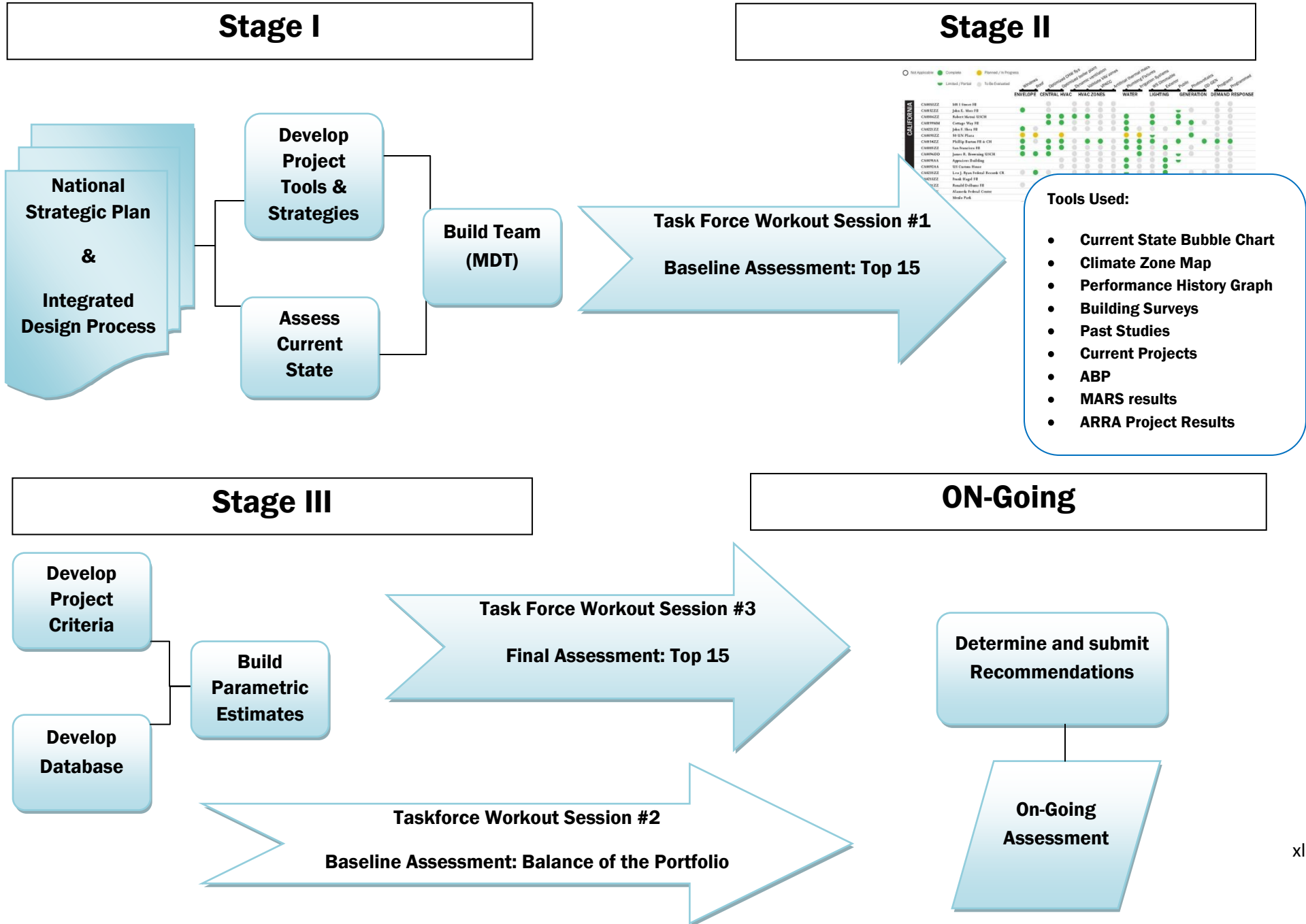
As of Today :

The taskforce has met 2 times.

- Meeting #1 - The first meeting (3 days) was set up to use a test set of 15 buildings to determine how we would approach this newly formed review process, what resources we would need, and how effective the review would be in achieving real results. The 15 were selected based on their overall energy usage (the top 15 energy users were first) All 15 were reviewed at the end of December.
 - Action - Parametric estimates are now being performed.
 - Future Meeting #3 – to discuss the results of the 15 (March 18th)
- Meeting #2 – This meeting (3.5 days) looked at the balance of the portfolio to establish a baseline for the entire owned inventory. We intend to run them through a similar process as the 15 once we understand how the final review stage goes and can set a foundation for the regular reviews which are tentatively scheduled to begin in June 2013.
- On-going - Each building will be reviewed at least once every 2 years and will leverage the MARS and Portfolio PCS (Physical Condition Survey).

To understand activities and progress to date see Building Task Force Diagram found below

Building Assessment Task Force



APPENDIX H



Guidelines for Establishing Multi-disciplinary Team

1. PURPOSE

Multidisciplinary teams are groups of professionals from diverse disciplines who come together to provide comprehensive assessment and consultation on current topics of the day. While their primary purpose is typically to help GSA improve daily processes and procedures, teams may fulfill a variety of additional functions. They can promote coordination between agencies; provide a "checks and balances" mechanism to ensure that the interests and rights of all concerned parties are addressed; and identify skill or service gaps and breakdowns in coordination or communication between Central Office/Regions/Divisions and/or individuals. They also enhance the professional skills and knowledge of individual team members by providing a forum for learning more about the strategies, resources, and approaches used by various disciplines.

2. SCOPE

The scope of the multi-disciplinary team is threefold:

1. Result-orientated tasks or content aspect
2. Methodology – define team member's interactions and how members work together (e.g. leadership, team roles, etc.)
3. Resource: time, budget, computer facility, educational tools and administrative support.

3. DEFINITIONS

4. PROCEDURE

1. Determine size of Multi-Disciplinary Team – The size of the team is generally limited to the smallest number of members necessary to accomplish its goals, without sacrificing the diversity necessary to achieve quality results within a federal facility. Seven to ten people on a team have the most success in terms of group dynamics. Once a group grows outside this range, it becomes more challenging to make decisions.
2. Hold kick-off meeting (tentative agenda and Robert's Rules of Order provided)
3. Select Team Champion(s). The Champion(s) does not have to be a manager. The Champion will be responsible for maintaining team momentum. This role can be rotated with a suggested frequency of no more than every year in order to ensure consistency and effectiveness to serve the role.

Responsibilities of Team Champion:

- Assign clear tasks for each member
- Regularly review and monitor progress of work
- Ensure that the team meets deadlines
- Discuss and agree on the timetable for major activities with the team



MULTIDISCIPLINARY TEAM

- Motivate team members
 - Resolve conflicts
 - Give guidance when needed
 - Helps members to overcome barriers.
4. Maintain momentum - The Teams will also need to hold productive and engaging meetings with an appropriate frequency – twice a month in the beginning to every month thereafter.
 5. Track Performance – Report progress and celebrate success with the Communication Team.

5. ROBERT'S RULES OF ORDER

Listen

- Allow one person to speak at a time, and avoid side conversations.
- Don't interrupt when a person is talking unless he/she is diverting from the issue being discussed.
- Before evaluating a member's contribution, others check their assumptions to ensure that they have properly understood.
- Seek first to understand others before you seek to be understood.
- Respect the views of all participants.

Talk

- Everyone participates.
- Each person speaks on his/her own behalf and lets others speak for themselves.
- Each person takes responsibility for his/her actions and results.
- One always has three options: accept it, work on it to make it better, or leave. Don't complain if you're not willing to make it better.
- Speak openly and honestly.
- Say what you mean and mean what you say, but preserve people's self-esteem.
- Members can disagree without fear.
- Give negative feedback appropriately: calmly, timely, privately, using present information, focused on issues and behaviors (not individuals). Disagree with what was said, but not with who said it.
- Give specific positive feedback (recognition) right away in public, but adapted to the receiver.
- Call a time out if you need one.
- Communicate immediately if you think you may not be able to fulfill an agreement.
- If you don't understand something, ask for clarification.
- If you see a problem that others haven't noticed, bring it to someone's attention.
- Clear communication of accountabilities for all work team members.

Meetings

- Clear objectives.
- Meetings must have an agenda.
- Meeting information needs to be circulated to everyone prior to the meeting.
- Use the meeting time and keep the discussion focused on the meetings objective(s).
- Start and end meetings on time.
- Use technological tools such as television or video- conferencing to facilitate the meeting.